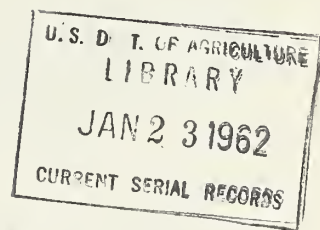


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Report of

EGG PRODUCTION TESTS

**Records of Stocks
Entered in Performance Tests
in the United States and Canada**

for the period 1960-61

Agricultural Research Service
UNITED STATES DEPARTMENT OF AGRICULTURE



Growth Through Agricultural Progress

FOREWORD

Egg Production Tests are designed to provide a reliable guide for poultrymen, hatcherymen, and breeders concerning the performance of stocks offered for sale by breeders and hatcherymen. This publication contains data on traits of economic importance compiled from results of all official Random Sample and Standard Egg Laying Tests in the United States and Canada during 1960-61.

The publication is divided into three separate categories: 1-Combined Summary, 2-Quartile Ranking, 3-Standard Egg Laying Tests. The first deals with Random Sample Egg Production Test data that has been treated by acceptable statistical procedures. It permits direct comparison of stocks that are entered in different tests. The second also deals with Random Sample Egg Production Test results and shows by "quartile rankings" the performance of each entry as compared to other entries in the same test. The third concerns records compiled by the Standard Egg Laying Tests.

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This publication is based upon recommendations of the National Committee on Random Sample Poultry Testing and the Council of American Official Poultry Tests. Information in the report was compiled by the Poultry Research Branch, Animal Husbandry Research Division, Agricultural Research Service, from data supplied by the Test Supervisors and the Council of American Official Poultry Tests. The statistical analysis for the Combined Summary was made by Biometrical Services, ARS. The publication of this report should not be construed as implying approval or endorsement by the U. S. Department of Agriculture of any of the stocks tested.

- Alberta Random Sample Egg Production Test
R. H. McMillan, Alberta Department of Agriculture, Edmonton
- Arizona Random Sample Test
Ernest L. Parker, Arizona State University, Tempe
- British Columbia Random Sample Egg Production Test, Abbotsford
W. H. Pope, B. C. Department of Agriculture, Victoria
- California Official Random Sample Egg Laying Test
Emery A. Johnson, Rt. 3, 2718 No. 99 Highway, Modesto
- Central Random Sample Egg Production Test
M. S. Mitchell, Poultry Division, Canada Department of Agriculture, Ottawa
- Florida Random Sample Test
A. W. O'Steen, Chipley
- Iowa Multiple Unit Poultry Test
LeRoy Kruskop, Iowa Poultry Association, National Plans Division Board,
535 E. Lincolnway, Ames
- Minnesota Random Sample Egg Production Test, Stillwater and St. Cloud
Robert E. Moehrle, Department of Agriculture, Dairy and Food, State Office Building,
St. Paul 1
- Missouri Official Random Sample Poultry Test
Noel Hall, Mountain Grove
- New Hampshire Multiple Unit Egg Production Test
W. C. Skoglund, Department of Poultry Science, University of New Hampshire, Durham
- New Jersey Random Sample Egg Laying Test
John J. Dowling, Jr., Rutgers University, New Brunswick
- Central New York Official Random Sample Poultry Test, Horseheads
Dean R. Marble, Poultry Department, Cornell University, Ithaca
- Western New York Official Random Sample Poultry Test, Stafford
Dean R. Marble, Poultry Department, Cornell University, Ithaca
- North Carolina Random Sample Egg Laying Test, Salisbury
G. A. Martin, School of Agriculture, North Carolina State College, Raleigh
- Pennsylvania Random Sample Laying Test
Paul J. Turek, Route 2, Harrisburg
- Rhode Island Random Sample Laying Test
M. R. McClung, University of Rhode Island, Kingston
- Tennessee Random Sample Laying Test
O. E. Goff, University of Tennessee, Knoxville
- Texas Random Sample Egg Production Test
Bill H. Doran, Texas A & M College, College Station
- Wisconsin Random Sample Egg Production Test, Oregon
Arnold Guthrie, Department of Agriculture, State Capitol, Madison 2

COMBINED SUMMARY

INTRODUCTION

This summary includes the combined results of the Random Sample Egg Production Tests conducted in the United States and Canada during 1960-61. The entries in the various tests consist of a random sample of hatching eggs or chicks of the stock being tested. The samples are drawn by prescribed methods to insure that the entry is typical of the stock it represents. All entries within a test are treated the same with respect to housing, feeding, management, and disease control with the objective of avoiding differences in performance due to environment.

All tests follow these basic principles in their operation. However, there are differences between tests including climatic conditions and other environmental factors which affect the results. For this reason direct comparisons of the results of two stocks in different tests may be misleading.

The primary purpose of this summary is the presentation of test results in a manner that will support sound evaluation of all stocks tested. To accomplish this, the results of all tests are combined, by stocks, with adjustments for test differences and the use of other accepted statistical procedures. The results of these computations are published as the regressed mean of each trait for each stock. The regressed means provide a sound basis for comparisons between stocks.

All stocks are listed in alphabetical sequence with the performance data (Regressed Mean) and the LSD^{1/} range for each trait at the 0.05 level of probability. It is essential, when comparing the performance of two stocks, to determine whether the regressed mean of one stock falls within the LSD range of the other stock. If it does, the odds are less than 19 in 20 that a real difference exists. If the regressed mean of a stock falls outside the LSD range of another stock, the odds are at least 19 in 20 that a real difference exists in the performance of the two stocks.

To avoid misinterpretation of the data the following explanatory material should be carefully reviewed.

HOW TO TELL WHETHER DIFFERENCES ARE REAL

Errors of two kinds influence the results of even the most carefully designed and operated tests. The first kind of error is the chance deviation or unavoidable "sampling error" made when a small sample of eggs or chicks represents an entry. The other kind of error is due to uncontrolled or unknown environmental differences between entries that happen in spite of all efforts to treat each entry exactly alike. The differences between the results for two entries in a single test may be due to these chance variations rather than to a real difference in the performance capabilities of the two stocks. The effect of such errors can be materially reduced by basing the comparisons on the combined results of several tests. If all entries compared were entered in the same tests, the simple averages could be utilized without adjustment.

The performance data (regressed means) reported in this summary are derived from the results reported by the individual tests. It is unlikely, however, that these means for any stock, even though entered in only one test, will coincide precisely with the performance data published by the test. The variations are due to adjustments for test differences, the number of tests entered, and the number of replicates per test. These statistical adjustments allow predictions to be made of what the average performance would have been for each stock if all stocks had been entered in all tests.

The statistical treatment applied to the test data is designed to reduce the influence of nongenetic variations but this cannot be accomplished perfectly. Consequently, estimates or predictions of performance cannot be made with absolute precision. Reliable predictions, within prescribed limitations, can be made as to whether a difference in the reported performance of two stocks represents a real difference in their performance. These predictions involve the use of the least significant difference (LSD) figures which have been computed for each trait or performance factor reported.

As the name implies, the least significant difference figures prescribe the approximate limits of difference that may be due to chance. Differences that equal or exceed the LSD probably are due to inherent differences in the stocks. The LSD is a reliable guide for the appraisal of differences but it is not infallible. Appraisals of differences, based on comparison with the LSD may be wrong and the probability of such errors are considered in computing the LSD.

^{1/} The least significant differences (LSD) referred to in this report were computed from the approximate standard error of the regressed mean and the significant studentized range value for 20 means as given in Duncan's table for the 0.05 probability level.

As an aid to the evaluation of significant differences among stocks, the approximate LSD range at the 0.05 level of probability (19:1 odds) is given for each regressed mean in the alphabetical listing of all stocks. The LSD range represents the regressed mean of a stock, plus and minus the LSD (less one unit of measurement) at the 0.05 level (refer to Analytical Procedure for complete explanation). As an example, for the "Age at 50 percent Production" trait, the LSD is 7 days. Thus stock 3, with a regressed mean for this trait of 172 days has an LSD range of 166 (172 minus 6) to 178 (172 plus 6). Stock 8, with a regressed mean of 180 days, does not fall within the LSD range of stock 3 (166 to 178) and consequently is considered to be significantly different from stock 3. Likewise, stocks 264, 5, and 7, with regressed means of 178, 175, and 167 respectively, are not significantly different from stock 3 since each regressed mean falls within the LSD range of stock 3.

EXPLANATION OF INCOME FIGURES

The "Income Over Feed and Chick Cost" figures reported in this summary represent the sales value of the eggs produced and of the hens at the end of the test minus the cost of the chicks and the feed used during the growing and laying periods. These figures may be useful in comparing the overall performance of stocks, but they should not be considered as predictions of "profit" to be obtained under commercial operations. The "income" figures should be reduced by other costs, such as labor, building and equipment depreciation, vaccination, litter, interest, taxes, and insurance, to approximate profits that might be expected under commercial conditions. Surveys conducted among commercial producers indicate that such costs may range from \$1.00 to \$2.00 per pullet housed.

EXPLANATION OF TERMS AND ABBREVIATIONS

Stock:	A term used to identify a specific breeding combination of chickens. These breeding combinations may include pure strains, strain crosses, breed crosses, incrossbreds, or combinations thereof.				
Overall Mean:	The average of the test adjusted means for all stocks. This estimates what the overall average would have been if all stocks had been entered in all tests.				
Range:	The range represents the difference between the maximum and minimum performance among the 184 stocks, based on the regressed means.				
Repeatability:	This figure can vary from 0.00 to 1.00. The higher the figure the greater is the likelihood of stocks ranking in the same order from one test to another.				
Correlation Among Replicates:	This correlation measures the repeatability among replicates of the same stock in the same test. It may vary from 0.00 to 1.00 but can not be lower than the repeatability of stock, performance between tests. The higher the correlation among replicates the less need there is for replication of stocks within tests. The difference between repeatability and the correlation among replicates is a measure of the importance of the test by stock interaction.				
Test Adjustment Factor:	The amount by which a given test was above or below the average of the 13 tests which reported data for all 15 traits. These factors were determined on an intra-stock basis with a least-squares analysis.				
Regressed Mean:	The test adjusted stock mean after weighting it according to the number of tests in which the stock was entered, the number of replicates per test, the repeatability, and the correlation among replicates in the same test.				
Least Significant Difference:	The LSD prescribes the approximate limit of difference that may be due to chance. This has been computed at the 5% level of significance and may be expressed as odds of 19:1 against differences as large as the LSD being due to chance alone.				
LSD Range:	These figures represent the regressed mean of a stock, plus and minus the LSD at the 5% level (less one unit of measurement). For an explanation of how these were computed for the low percentage traits, refer to the "Analytical Procedures" section.				

Kind of Stock:	AW	Austra White	LS	Light Sussex	BX	Crossbred
	BA	Black Australorp	NH	New Hampshire	IN	Incross
	BL	Brown Leghorn	RIR	Rhode Island Red	INX	Inbred Cross
	BPR	Barred Plymouth Rock	RIW	Rhode Island White	LX	Line Cross
	CG	California Gray	WA	White Austra	PS	Pure Strain
	CR	Columbian Rock	WL	White Leghorn	SX	Strain Cross
	DW	Dominant White	WPR	White Plymouth Rock	Syn.	Synthetic

This summary includes performance data on 184 stocks entered in 19 Random Sample Egg Production Tests for 1960-61. These tests were conducted at 43 different locations. Data were reported on all 15 traits for 13 of these 43 locations. Tests that were not included in the computation of the regressed means for each of the 15 traits are shown under the heading "Tests Not Included" in the tabulation on pages 10 and 11. All data reported from all tests were included in the combined analysis.

The performance data were reported by replicate pens by all tests with replicates. Data from the Texas test were reported on the basis of six, eight bird replicates per entry. The average for the three replicates that were in the same house was used as the pen average for the combined analysis. Likewise, data from the four replicates of the Tennessee test were combined to give only two replicates because of the small number of birds per replicate. Data for some traits were reported on 1016 pens for the 184 stocks. The number of pens and the number of stocks tested at each of the 43 locations are given in the first two columns of the table on page 8.

The replicate data were analyzed by least-squares procedures to obtain the test adjustment factors (pages 8 and 9) and the repeatability estimates and the correlation among replicates within tests for each trait (pages 10 and 11). In order to place the results for all traits on a comparable environmental basis, the adjustment factors to adjust for test differences were expressed as a plus or minus deviation from the average for the 13 locations which reported complete performance information. These factors were then used to adjust the simple stock average for test differences to obtain the test adjusted stock averages (least-squares stock means). The adjusted stock averages were then regressed toward the overall mean ($\hat{\mu}$) to account for variations in number of tests entered and number of replicates per test.

The percentage data for the six traits, growing mortality, laying mortality, large blood spots, small blood spots, large meat spots and small meat spots were converted to angles with the arc sin transformation prior to the analysis. The test adjustment factors, repeatability, the correlation among replicates, the test adjusted stock averages, the overall mean ($\hat{\mu}$), the regressed means and the LSD range values were all computed with the transformed percentages for these six traits. However, the test adjustment factors shown in the table on pages 8 and 9 and the regressed means and LSD range values shown for these traits in the alphabetic listing of stocks are given in percent. The angular transformation for these traits causes the difference between the regressed mean and the low LSD range value to be less than the difference between the regressed mean and the high LSD range value. Nevertheless the LSD range for these traits may be used in the same manner as the LSD range for other traits to aid in the evaluation of differences among stocks.

The formula used to compute the regressed means is:

$$\text{Regressed Mean} = \hat{\mu} + \frac{r/C}{1 + (k-1)x + \left(\frac{1-Ck}{C}\right)r} (\hat{\sigma})$$

where: $\hat{\mu}$ = the average of the test adjusted stock means.

r = repeatability.

x = the correlation among replicates.

k = the average number of replicates per test.

C = the diagonal inverse element for that stock. The reciprocal of C , i.e., $\frac{1}{C}$, is equal to nk if the assumption is made that the adjustments for test effects are made without error; where n is the number of tests entered.

$\hat{\sigma}$ = the test adjusted stock average minus the overall mean ($\hat{\mu}$).

The Adjustment Factors Used to Adjust for Test Differences

Test	No. Pens	No. Stocks Tested	% Mortality Growing Period	% Mortality Laying Period	Days of Age at 50% Production	Egg Production Hen-Housed - No.	Egg Production Hen Day - %	Income Over Feed and Chick Cost - \$	Feed Per 24 Oz. of Eggs - Lbs.
Alberta	22	11	+0.53	+1.55	+ 7.25	-11.76	+ 0.34	+0.63	+0.04
Arizona	8	7	-0.25	-0.01	- .18	+11.06	+ 2.50	-0.47	+0.14
British Columbia	40	20	+0.30	+0.33	- 5.05	+ 9.44	+ 3.80	+1.01	-0.05
California Cage	100	50	--	+0.56	+ 4.54	-21.69	+ 7.35	--	--
California Floor	100	50	+1.30	+0.73	+ 2.74	-51.86	- 1.56	-0.46	+0.24
Central Canada	68	34	+0.00	-3.40	- 4.10	+26.32	- 0.96	+1.20	+0.22
Florida	24	19	-0.07	-1.88	- 1.44	+14.20	+ 0.36	-0.28	+0.11
Iowa #1	8	4	-0.72	0.00	+ 1.55	+33.14	+ 6.80	--	--
Iowa #2	8	4	-0.03	-0.01	+ 1.34	+36.42	+ 7.77	--	--
Iowa #3	8	4	-0.73	+0.31	-21.85	+69.13	+15.21	--	--
Iowa #4	8	4	-4.80	+0.12	-15.70	+49.25	+ 9.09	--	--
Iowa #5	8	4	-0.39	-0.09	-13.57	+35.79	+ 4.39	--	--
Iowa #6	8	4	-0.79	+0.26	+ 6.54	+ 7.38	+ 1.02	--	--
Iowa #7	8	4	-3.45	-0.70	+ 1.38	+21.00	+ 1.68	--	--
Iowa #8	8	4	-1.50	+0.36	+ 4.61	+ 7.81	+ 1.19	--	--
Iowa #9	8	4	-3.10	-1.08	- 8.31	+37.94	+ 4.67	--	--
Iowa #10	7	4	-4.20	-0.15	- 6.63	+47.74	+ 8.91	--	--
Iowa #11	8	4	-3.30	-0.53	- 7.43	+37.31	+ 3.21	--	--
Iowa #12	8	4	-3.20	-0.05	- 5.61	+14.34	- 1.54	--	--
Iowa #13	8	4	0.00	-0.15	-14.58	+61.19	+12.53	--	--
Iowa #14	8	4	0.00	+0.95	+ 5.01	+26.30	+ 6.67	--	--
Iowa #15	8	4	-0.56	-2.10	-26.12	+56.53	+ 5.21	--	--
Iowa #16	8	4	+0.15	+2.40	- 9.23	+24.41	+ 3.98	--	--
Iowa #17	6	3	-4.35	0.00	+ 2.08	+14.94	+ 1.12	--	--
Iowa #18	8	4	0.00	-0.36	- 3.51	+36.47	+ 4.75	--	--
Iowa #19	8	4	-0.96	-0.02	- 8.66	+33.05	+ 4.32	--	--
Iowa #20	8	4	-4.40	-0.08	-13.45	+66.92	+14.09	--	--
Minnesota #1	16	16	-6.30	+0.49	-29.59	+ 9.41	- 1.48	+1.15	-0.05
Minnesota #2	16	16	-1.65	+0.25	-12.03	+ 0.07	- 1.48	+1.03	-0.15
Missouri	56	56	-0.10	+0.87	- .70	-13.96	- 2.11	-0.48	-0.40
North Carolina	40	20	+0.31	+0.05	- .19	- 5.20	- 1.45	+1.02	+0.24
New Hampshire #1	15	15	-0.06	-0.05	-21.99	+27.86	+ 4.46	+0.64	-0.56
New Hampshire #2	15	15	-1.20	-4.00	- 8.86	+25.97	+ 0.96	+0.42	-0.09
New Hampshire #3	15	15	+1.30	+0.28	-10.66	+21.26	+ 5.35	+0.55	-0.43
New Jersey Floor	21	21	--	+0.12	- 9.87	+14.88	+ 2.65	-1.13	-0.26
New Jersey Cage	21	21	--	+1.01	- 7.87	-15.75	- 4.93	-1.83	+0.11
Central New York	22	22	+0.21	+0.26	- .08	+ 8.98	+ 3.77	+0.41	-0.18
Western New York	44	22	+0.65	+1.30	- 2.66	- 2.65	+ .99	+0.25	-0.16
Pennsylvania	48	48	-7.10	+0.08	- 3.14	- 9.38	- 5.83	-0.79	+0.06
Rhode Island	40	20	+0.51	0.00	+ 3.56	- 9.42	- 3.23	-1.52	-0.15
Tennessee	56	28	0.00	-0.31	+ 5.17	+32.16	+ 7.80	-0.07	-0.82
Texas	60	24	+0.03	+0.02	- 3.95	+16.42	+ 4.71	-0.16	+0.17
Wisconsin	52	26	0.00	-0.14	+ .04	- 8.02	- 4.36	+0.40	+0.20

The Adjustment Factors Used to Adjust for Test Differences

Test	Egg Weight - Oz.	Body Weight - Lbs.	Albumen Quality Haugh Units	% Blood Spots 1/8 inch or More	% Blood Spots Less than 1/8 Inch	% Meat Spots 1/8 inch or More	% Meat Spots Less than 1/8 Inch	Shell Thickness 1/1000 Inch
Alberta	+0.43	-0.03	+ 2.50	+0.02	+0.06	+0.08	+0.49	+0.76
Arizona	+0.39	+0.61	- 1.05	+0.10	+0.09	+0.17	+0.11	+0.03
British Columbia	-0.28	-0.44	+ 2.44	+0.22	0.00	-0.02	-0.22	+1.41
California Cage	-0.27	+0.11	+ 1.79	-0.34	-1.30	+0.08	+0.25	-1.19
California Floor	-0.23	+0.06	+ 3.13	-0.07	-0.31	+0.09	+0.37	-1.11
Central Canada	+0.13	+0.15	+ 9.42	+0.08	0.00	-0.79	-0.35	+0.92
Florida	+0.18	+0.02	- 2.58	-0.05	0.00	-2.00	-0.41	-0.41
Iowa #1	+0.10	+0.14	- 5.16	--	--	--	--	-0.68
Iowa #2	+0.09	-0.05	- 6.56	--	--	--	--	-0.87
Iowa #3	-0.40	+0.49	- 6.43	--	--	--	--	-0.57
Iowa #4	-0.48	+0.28	- 7.87	--	--	--	--	-0.92
Iowa #5	+0.68	0.00	- 5.68	--	--	--	--	-0.87
Iowa #6	-0.06	-0.15	- 4.46	--	--	--	--	-1.06
Iowa #7	+0.22	-0.09	- 3.50	--	--	--	--	-0.70
Iowa #8	-0.16	-0.05	- 5.21	--	--	--	--	-0.49
Iowa #9	+0.48	+0.25	- 6.13	--	--	--	--	-0.65
Iowa #10	+0.63	+0.34	- 6.35	--	--	--	--	-0.73
Iowa #11	+0.01	+0.14	- 5.96	--	--	--	--	-0.86
Iowa #12	+0.11	+0.35	- 7.38	--	--	--	--	-0.96
Iowa #13	+0.32	-0.64	- 4.83	--	--	--	--	-0.82
Iowa #14	+1.24	+0.01	- 3.18	--	--	--	--	+0.02
Iowa #15	+0.65	-0.02	- 4.00	--	--	--	--	-0.38
Iowa #16	+0.54	+0.09	- 6.03	--	--	--	--	-0.17
Iowa #17	+0.74	+0.29	- 4.98	--	--	--	--	-0.43
Iowa #18	+0.28	-0.36	- 5.64	--	--	--	--	-1.08
Iowa #19	-0.19	+0.12	- 4.04	--	--	--	--	-0.78
Iowa #20	-0.32	+0.06	- 7.61	--	--	--	--	-1.31
Minnesota #1	-0.72	+0.02	- 1.55	--	--	--	--	-2.05
Minnesota #2	-0.82	-0.10	- 4.12	--	--	--	--	-1.79
Missouri	+0.71	+0.03	- 8.06	+0.48	+0.13	+0.33	+0.54	-0.48
North Carolina	-0.65	-0.28	- 0.58	-0.09	-0.15	+0.18	0.00	-0.15
New Hampshire #1	-0.04	-0.32	--	--	--	--	--	--
New Hampshire #2	-0.31	+0.47	--	--	--	--	--	--
New Hampshire #3	-0.32	+0.23	--	--	--	--	--	--
New Jersey Floor	-0.04	-0.19	- 2.64	+0.21	-0.13	--	--	-0.26
New Jersey Cage	+0.60	+0.04	- 0.67	+0.20	+0.22	--	--	-0.24
Central New York	-0.39	-0.19	- 1.01	-0.01	-0.23	--	--	+0.68
Western New York	-0.65	-0.30	- 0.74	0.00	-0.04	--	--	+0.71
Pennsylvania	-0.37	+0.05	- 1.80	0.00	0.00	+0.40	+0.33	-1.01
Rhode Island	+0.06	+0.15	+ 0.96	0.00	-0.19	+0.07	+0.02	-0.84
Tennessee	+0.08	+0.04	+ 6.54	-0.05	-0.10	+0.02	-0.81	+0.56
Texas	-0.30	-0.11	- 0.51	-0.04	+0.04	0.00	+0.14	-0.56
Wisconsin	-0.17	-0.25	-10.41	-0.24	-0.08	-0.28	-0.67	+0.87

Analytical Data For The Traits Measured

Trait	Tests Not Included	Overall Means	Regressed Means		Repeat-ability	Correlation Among Replicates
			Min.	Max.		
Percent mortality to 150 days or subsequent age at housing	New Jersey, & California-cage	3.7	2.1	5.9	0.123	0.123
Percent laying house mortality computed from 150 days or subsequent age at housing to 500 days of age.	None	11.9	4.5	22.3	.221	.221
Days of age to 50% production calculated from the first day of the first two consecutive days of 50% production for living birds in the entry at that time.	None	174	164	187	.468	.555
Number of eggs per pullet housed to 500 days of age.	None	218.5	184.9	244.0	.375	.475
Percent hen-day production from the time the birds reached 50% production to 500 days of age.	None	69.7	64.5	75.9	.304	.457
Income over feed and chick cost per pullet housed, with chick cost in 1,000 lots at hatch date adjusted for mortality (accidental deaths, sexing errors and missing chicks not included).	California-cage, & Iowa	2.62	1.89	3.12	.353	.626
Pounds of feed per 24 ounces of egg produced, computed from a bulk weighing of eggs one day every two weeks or at least 2 days a month at equal intervals.	California-cage, & Iowa	4.53	4.07	5.38	.482	.641
Average annual egg weight computed from bulk weighings at least every two weeks or two days a month at equal intervals.	None	24.9	23.7	26.0	.506	.690
Body weight at end of test.	None	4.9	3.9	7.3	.870	.904
Albumen quality-Haugh Units measured on one day's eggs per quarter or every three months, at equal intervals, broken-out basis.	New Hampshire	77.7	72.0	82.9	.538	.600
Percentage of eggs with (one or more) large blood spots 1/8 inch or more, computed from at least 3 days eggs per quarter, broken-out basis.	Iowa, Minnesota, & New Hampshire	1.6	.4	3.6	.265	.393
Percentage of eggs with (one or more) small blood spots less than 1/8 inch, computed from at least 3 days eggs per quarter, broken-out basis.	Iowa, Minnesota, & New Hampshire	2.2	.8	6.2	.285	.602

Analytical Data For The Traits Measured

Trait	Tests Not Included	Overall Means	Regressed Means		Repeat-ability	Correlation Among Replicates
			Min.	Max.		
Percentage of eggs with (one or more) large colored meat spots 1/8 inch or more, computed from at least 3 days eggs per quarter, broken-out basis.	Iowa, Minnesota, New Hampshire, New Jersey, Central N. Y. , & Western N. Y.	1. 4	0. 0	21. 2	0. 837	0. 858
Percentage of eggs with (one or more) small colored meat spots less than 1/8 inch, computed from at least 3 days eggs per quarter, broken-out basis.	Iowa, Minnesota, New Hampshire, New Jersey, Central N. Y. , & Western N. Y.	2. 6	0. 0	40. 4	. 855	. 885
Shell thickness by direct measurement to nearest 1/1000 inch from at least one breakout each quarter	New Hampshire.	13. 8	13. 2	14. 3	. 391	. 579

Starting Date, Ending Date, Number of Entries, Pullets per Entry and Length of 1960-61 Tests

Test	Starting Date	Ending Date	No. Entries	Pullets per Entry	Length of Test
Alberta	April 5, 1960	August 18, 1961	11	100	500 days
Arizona	February 16, 1960	June 30, 1961	8	75	500 days
British Columbia	April 1, 1960	August 13, 1961	20	90	500 days
California	March 4, 1960	September 14, 1961	50	116	560 days
Central Canada	March 29, 1960	August 9, 1961	34	120	499 days
Florida	March 25, 1960	August 6, 1961	24	50	500 days
Iowa	February 19 to April 15, 1960	June 13 to August 14, 1961	16	1400 (Approx.)	486 days
Minnesota	April 3, 1960	August 16, 1961	16	160	500 days
Missouri	March 19, 1960	August 1, 1961	56	50	500 days
New Hampshire	May 2, 1960	September 15, 1961	15	475	500 days
New Jersey	March 29, 1960	August 10, 1961	24	50	500 days
Central New York	February 26, 1960	July 10, 1961	22	50	500 days
Western New York	March 25, 1960	August 7, 1961	22	50	500 days
North Carolina	February 12, 1960	June 25, 1961	20	100	500 days
Pennsylvania	May 2, 1960	September 15, 1961	48	50	500 days
Rhode Island	May 2, 1960	September 15, 1961	20	52	500 days
Tennessee	April 1, 1960	August 13, 1961	28	60	500 days
Texas	March 1, 1960	July 13, 1961	30	48	500 days
Wisconsin	March 8, 1960	July 19, 1961	26	50	500 days

All Stocks Entered, with Regressed Means and LSD Range for each Trait

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
3	Allstate Hatchery Willmar, Minnesota	WL			2.4		8.4
		SX	LX 330	4.1	6.1	14.5	21.8
264	Ames In-Cross Des Moines, Iowa	INX	W-40 Royal		1.8		3.9
				3.2	5.1	8.5	14.5
5	Ames In-Cross Des Moines, Iowa	INX	Ames 424		1.9		5.6
				3.3	5.2	10.8	17.4
7	Ames In-Cross Des Moines, Iowa	INX	Ames 434 R		2.1		8.1
				3.7	5.6	14.1	21.3
8	Ames In-Cross Des Moines, Iowa	INX	Ames 505		1.7		6.5
				3.0	4.8	11.9	18.8
267	Ames In-Cross Des Moines, Iowa	INX	#525		2.0		5.8
				3.5	5.3	11.0	17.7
502	Andrews, J. J. Rt. 3, Chilliwack, Br. Columbia	WL			2.0		7.8
		SX	813	3.5	5.3	13.7	20.8
10	Anthony, Geo. M. & Sons Strausstown, Pennsylvania	WL			1.8		7.4
		SX	Anthony	3.3	5.1	13.2	20.3
503	Appleby Poultry Farm Mission City, Br. Columbia	WL			1.5		5.7
		SX	Life Line	2.9	4.6	11.0	17.6
138	Arbor Acres Farm, Inc. Glastonbury, Connecticut	WL			2.5		7.1
		SX	Arbor Acres Queen	4.2	6.2	12.8	19.8
238	Arbor Acres Farm, Inc. Glastonbury, Connecticut	WL			2.5		6.3
		SX	Arbor Acres Queen B	4.1	6.2	11.7	18.5
504	Arnold, C. T. Arborg, Manitoba	WL x (RIRxLS)	Cream Egg Layer		3.3		13.0
				5.1	7.3	20.1	28.2
11	Avery, C. T. & Son Colrain, Massachusetts	WRxRIR BX	Avery		2.7		7.6
				4.4	6.4	13.4	20.6
232	Avery, C. T. & Son Colrain, Massachusetts	RIR PS	Candidate Mating		1.7		6.3
				3.1	4.9	11.8	18.6
13	Babcock Poultry Farm, Inc. Box 286, Ithaca, New York	WL			2.0		5.7
		SX	Bessie	3.5	5.3	10.9	17.6
237	Babcock Poultry Farm, Inc. Box 286, Ithaca, New York	WL			2.1		4.7
		SX	Bonnie	3.7	5.6	9.5	15.9
15	Bagby Poultry Farm Sedalia, Missouri	WL			1.8		6.3
		PS	One Grade	3.2	5.0	11.7	18.5
505	Balakshin, N. A. Rt. 3, Chilliwack, Br. Columbia	WL			2.1		5.8
		SX	Balakshin	3.6	5.4	11.0	17.7

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait

AGE AT 50% PRODUCTION (Days)		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST (\$)		FEED PER 24 OZ. OF EGGS PRODUCED (lbs)		EGG WEIGHT (oz)		BODY WEIGHT (lbs)		STOCK CODE
		HEN HOUSED		HEN DAY										
		RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE									
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
172	166 178	216.3	196.4 236.2	69.2	65.1 73.3	2.56	2.05 3.07	4.47	4.11 4.83	24.7	24.2 25.2	4.7	4.4 5.0	3
178	172 184	226.5	206.6 246.4	71.5	67.4 75.6	2.87	2.36 3.38	4.26	3.90 4.62	25.3	24.8 25.8	4.5	4.2 4.8	264
175	169 181	217.3	197.4 237.2	68.8	64.7 72.9	2.57	2.06 3.08	4.61	4.25 4.97	25.2	24.7 25.7	4.5	4.2 4.8	5
167	161 173	226.8	206.9 246.7	71.1	67.0 75.2	2.53	2.02 3.04	4.50	4.14 4.86	24.4	23.9 24.9	5.0	4.7 5.3	7
180	174 186	205.0	185.1 224.9	65.4	61.3 69.5	2.42	1.91 2.93	4.72	4.36 5.08	25.4	24.9 25.9	6.1	5.8 6.4	8
185	179 191	216.1	196.2 236.0	70.3	66.2 74.4	2.66	2.15 3.17	4.42	4.06 4.78	25.5	25.0 26.0	5.6	5.3 5.9	267
172	166 178	223.1	203.2 243.0	71.4	67.3 75.5	2.69	2.18 3.20	4.37	4.01 4.73	24.7	24.2 25.2	4.2	3.9 4.5	502
174	168 180	220.3	200.4 240.2	69.9	65.8 74.0	2.54	2.03 3.05	4.56	4.20 4.92	25.2	24.7 25.7	4.7	4.4 5.0	10
175	169 181	225.7	205.8 245.6	71.1	67.0 75.2	2.77	2.26 3.28	4.50	4.14 4.86	25.0	24.5 25.5	4.7	4.4 5.0	503
175	169 181	223.5	203.6 243.4	72.1	68.0 76.2	2.81	2.30 3.32	4.25	3.89 4.61	24.9	24.4 25.4	4.3	4.0 4.6	138
176	170 182	221.2	201.3 241.1	71.1	67.0 75.2	2.73	2.22 3.24	4.37	4.01 4.73	25.1	24.6 25.6	4.4	4.1 4.7	238
174	168 180	201.4	181.5 221.3	67.9	63.8 72.0	2.25	1.74 2.76	4.66	4.30 5.02	24.9	24.4 25.4	5.1	4.8 5.4	504
179	173 185	218.1	198.2 238.0	70.3	66.2 74.4	2.37	1.86 2.88	4.93	4.57 5.29	24.2	23.7 24.7	5.9	5.6 6.2	11
174	168 180	227.8	207.9 247.7	72.3	68.2 76.4	2.62	2.11 3.13	4.76	4.40 5.12	24.3	23.8 24.8	6.0	5.7 6.3	232
170	164 176	224.8	204.9 244.7	70.8	66.7 74.9	2.73	2.22 3.24	4.40	4.04 4.76	24.8	24.3 25.3	4.5	4.2 4.8	13
166	160 172	239.9	220.0 259.8	74.0	69.9 78.1	2.97	2.46 3.48	4.31	3.95 4.67	24.4	23.9 24.9	4.7	4.4 5.0	237
169	163 175	227.2	207.3 247.1	71.3	67.2 75.4	2.80	2.29 3.31	4.42	4.06 4.78	25.0	24.5 25.5	4.7	4.4 5.0	15
173	167 179	231.8	211.9 251.7	73.2	69.1 77.3	2.81	2.30 3.32	4.37	4.01 4.73	24.2	23.7 24.7	4.7	4.4 5.0	505

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
259	Ball Poultry Farm Owego, New York	WL	SX #591	3.9	2.3 5.8	12.8	7.1 19.8
233	Ball Poultry Farm Owego, New York	WL	SX #592	3.8	2.2 5.7	12.9	7.2 20.0
265	Ballew, Ken, Hatchery Mansfield, Missouri		BX Bee Line #99	4.0	2.4 5.9	12.7	7.1 19.7
269	Baumgartner Poultry Farms Litchfield, Minnesota	WL	SX #408	3.8	2.3 5.8	11.0	5.8 17.7
20	Beamsdale Farm Rt. 2, Lawndale, North Carolina	WL	SX Beamsdale 66	2.9	1.5 4.6	13.1	7.4 20.2
22	Booth Farms & Hatchery Clinton, Missouri		INX Booth Line 351	4.0	2.4 6.0	12.0	6.5 18.8
268	Booth Central Breeding Farm Clinton, Missouri	WL	PS Super Star	4.0	2.4 6.0	12.2	6.7 19.1
230	Brender's Leghorns Ferndale, New York	WL	SX Money Maker #1	4.1	2.5 6.1	10.9	5.7 17.5
506	Buchanan's Poultry Ranch Haney, Br. Columbia	WL x (WL x BA)	Kanaka White	4.2	2.6 6.2	16.2	9.8 23.8
26	Bundesen Brothers Petaluma, California	CG x WL	BX Graycie	3.1	1.7 4.8	15.9	9.6 23.5
29	Cameron Hatchery Beaver Springs, Pennsylvania	WL	SX DMX	3.6	2.1 5.5	11.4	6.0 18.1
30	Carey Farms Rt. 7, Marion, Ohio	WL	SX Carey Nicks	4.6	2.9 6.7	13.7	7.8 20.8
31	Cashman Leghorn Farm Webster, Kentucky	WL	SX Hi-Cash	3.3	1.9 5.2	13.1	7.4 20.2
32	Childers Hatchery Santa Ana, California	CG x WL	BX Childers	3.1	1.7 4.8	9.7	4.8 16.1
507	Clark, H. R. Bürtt's Corner, New Brunswick	RIR x CR	BX Clark's 41	3.1	1.7 4.9	12.1	6.6 19.0
508	Clark's Poultry Farm Box 351, Brandon, Manitoba	RIR x (LS x RIR)	Paymaster 101	3.2	1.8 5.0	10.8	5.6 17.4
34	Colonial Poultry Farms Pleasant Hill, Missouri	WL	PS Best Egg Grade	3.8	2.3 5.8	13.2	7.4 20.3
35	Colonial Poultry Farms Pleasant Hill, Missouri	WL	IN True Line 365	5.2	3.4 7.5	13.1	7.3 20.1

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST		FEED PER 24 OZ. OF EGGS PRODUCED		EGG WEIGHT		BODY WEIGHT		STOCK CODE
(Days)		HEN HOUSED (No.)		HEN DAY (%)		(\$)		(lbs)		(oz)		(lbs)		
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
170	164 176	219.0	199.1 238.9	70.1	66.0 74.2	2.59	2.08 3.10	4.46	4.10 4.82	24.8	24.3 25.3	4.7	4.4 5.0	259
172	166 178	214.3	194.4 234.2	68.4	64.3 72.5	2.43	1.92 2.94	4.64	4.28 5.00	24.5	24.0 25.0	4.4	4.1 4.7	233
172	166 178	214.9	195.0 234.8	69.2	65.1 73.3	2.61	2.10 3.12	4.44	4.08 4.80	24.8	24.3 25.3	5.1	4.8 5.4	265
169	163 175	216.9	197.0 236.8	68.9	64.8 73.0	2.60	2.09 3.11	4.50	4.14 4.86	24.6	24.1 25.1	4.6	4.3 4.9	269
175	169 181	222.6	202.7 242.5	71.1	67.0 75.2	2.84	2.33 3.35	4.36	4.00 4.72	25.0	24.5 25.5	4.1	3.8 4.4	20
172	166 178	224.7	204.8 244.6	70.9	66.8 75.0	2.74	2.23 3.25	4.37	4.01 4.73	24.8	24.3 25.3	4.2	3.9 4.5	22
172	166 178	215.4	195.5 235.3	68.6	64.5 72.7	2.54	2.03 3.05	4.60	4.24 4.96	24.8	24.3 25.3	4.4	4.1 4.7	268
175	169 181	209.7	189.8 229.6	67.2	63.1 71.3	2.51	2.00 3.02	4.55	4.19 4.91	25.5	25.0 26.0	4.5	4.2 4.8	230
170	164 176	215.6	195.7 235.5	69.9	65.8 74.0	2.54	2.03 3.05	4.45	4.09 4.81	25.2	24.7 25.7	4.8	4.5 5.1	506
177	171 183	211.9	192.0 231.8	69.9	65.8 74.0	2.57	2.06 3.08	4.53	4.17 4.89	25.2	24.7 25.7	5.5	5.2 5.8	26
173	167 179	224.5	204.6 244.4	71.0	66.9 75.1	2.82	2.31 3.33	4.39	4.03 4.75	24.9	24.4 25.4	4.8	4.5 5.1	29
171	165 177	210.7	190.8 230.6	67.3	63.2 71.4	2.41	1.90 2.92	4.59	4.23 4.95	25.0	24.5 25.5	4.5	4.2 4.8	30
172	166 178	237.1	217.2 257.0	75.9	71.8 80.0	2.78	2.27 3.29	4.28	3.92 4.64	24.4	23.9 24.9	4.6	4.3 4.9	31
167	161 173	236.5	216.6 256.4	72.3	68.2 76.4	2.78	2.27 3.29	4.39	4.03 4.75	24.8	24.3 25.3	5.2	4.9 5.5	32
180	174 186	203.8	183.9 223.7	65.9	61.8 70.0	2.41	1.90 2.92	4.99	4.63 5.35	25.3	24.8 25.8	5.8	5.5 6.1	507
173	167 179	223.2	203.3 243.1	70.2	66.1 74.3	2.77	2.26 3.28	4.67	4.31 5.03	25.8	25.3 26.3	5.8	5.5 6.1	508
172	166 178	213.9	194.0 233.8	68.7	64.6 72.8	2.54	2.03 3.05	4.56	4.20 4.92	25.0	24.5 25.5	4.6	4.3 4.9	34
172	166 178	213.5	193.6 233.4	69.2	65.1 73.3	2.47	1.96 2.98	4.45	4.09 4.81	24.7	24.2 25.2	4.4	4.1 4.7	35

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
501	Co-Op Hatcheries Edmonton, Alberta	CR x RIR BX	Paramount Columbia X	3.2	1.8 5.0	10.9 17.5	25.3
37	Cornell University Ithaca, New York	WL PS	Random Bred	3.6	2.1 5.5	4.7 9.6	15.9
509	Couvoir Co-operatif Ste. Martine, Quebec	WL SX	98	2.8	1.5 4.5	5.9 11.2	17.9
510	Couvoir Co-operatif St. Augustin, Quebec	WL SX	Corvette	2.4	1.2 4.0	4.0 8.6	14.6
511	Dawson, Ivan B. Central Bedeque, P. E. I.	WL x (WLxBR)	Series 1000	4.6	2.9 6.7	9.5 15.8	23.4
45	DeKalb Agricultural Association Sycamore, Illinois	INX	DeKalb 101	2.5	1.2 4.1	4.2 8.8	15.0
48	DeKalb Agricultural Association Sycamore, Illinois	INX	DeKalb 131	2.1	1.0 3.6	3.3 7.5	13.3
256	Del Rio Farm Mesa, Arizona	RIR PS	Del Rio	3.4	2.0 5.3	5.9 11.2	17.8
51	Demler Farms Anaheim, California	WL SX	One Grade	4.1	2.5 6.2	8.4 14.5	21.8
52	Demler Farms Anaheim, California	SYN x WL BX	Demler Kross	3.7	2.1 5.6	6.7 12.2	19.1
254	Demler Farms Anaheim, California	INX	Demler IBX	2.6	1.3 4.2	6.9 12.6	19.5
512	Deverill, Mrs. A. C. Eriksdale, Manitoba	NH x LS BX	Keyline 403	5.3	3.4 7.5	7.3 13.0	20.1
513	deZeeuw Leghorn Breeder South Edmonton, Alberta	WL SX	601	3.1	1.7 4.9	7.5 13.3	20.4
514	deZeeuw Leghorn Breeder South Edmonton, Alberta	WL SX	752	3.9	2.4 5.9	6.0 11.3	18.0
54	Drake, John W. Skillman, New Jersey	WL PS	One Grade	---	---	5.7 10.9	17.6
270	Dryden Farms, Inc. Box 951, Modesto, California	CG x WL BX	Gray X Leghorn	4.0	2.4 5.9	6.9 12.5	19.4
271	Dryden Farms, Inc. Box 951, Modesto, California	WL SX	SX 60	3.4	1.9 5.2	9.2 15.4	22.9
273	Dryden Farms, Inc. Box 951, Modesto, California	WL SX	SX 72	3.9	2.3 5.9	11.0 17.7	25.5

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST		FEED PER 24 OZ. OF EGGS PRODUCED		EGG WEIGHT		BODY WEIGHT		STOCK CODE
		HEN HOUSED		HEN DAY										
		(Days)		(No.)											($)		(lbs)		(oz)		(lbs)
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
173	167 179	188.2	168.3 208.1	64.5	60.4 68.6	2.14	1.63 2.65	5.15	4.79 5.51	24.8	24.3 25.3	5.6	5.3 5.9	501
175	169 181	219.8	199.9 239.7	69.4	65.3 73.5	2.53	2.02 3.04	4.53	4.17 4.89	24.2	23.7 24.7	4.6	4.3 4.9	37
173	167 179	225.6	205.7 245.5	71.5	67.4 75.6	2.76	2.25 3.27	4.40	4.04 4.76	24.7	24.2 25.2	5.2	4.9 5.5	509
174	168 180	232.2	212.3 252.1	71.5	67.4 75.6	2.98	2.47 3.49	4.31	3.95 4.67	25.4	24.9 25.9	4.8	4.5 5.1	510
178	172 184	201.3	181.4 221.2	69.6	65.5 73.7	2.35	1.84 2.86	4.69	4.33 5.05	24.8	24.3 25.3	5.4	5.1 5.7	511
168	162 174	226.0	206.1 245.9	69.3	65.2 73.4	2.70	2.19 3.21	4.24	3.88 4.60	25.2	24.7 25.7	4.5	4.2 4.8	45
168	162 174	236.1	216.2 256.0	72.4	68.3 76.5	2.96	2.45 3.47	4.20	3.84 4.56	24.8	24.3 25.3	4.3	4.0 4.6	48
170	164 176	223.1	203.2 243.0	70.6	66.5 74.7	2.56	2.05 3.07	4.55	4.19 4.91	24.8	24.3 25.3	5.8	5.5 6.1	256
174	168 180	207.9	188.0 227.8	67.6	63.5 71.7	2.65	2.14 3.16	4.36	4.00 4.72	24.4	23.9 24.9	4.3	4.0 4.6	51
170	164 176	209.9	190.0 229.8	68.6	64.5 72.7	2.58	2.07 3.09	4.48	4.12 4.84	24.8	24.3 25.3	5.3	5.0 5.6	52
172	166 178	217.4	197.5 237.3	69.3	65.2 73.4	2.60	2.09 3.11	4.49	4.13 4.85	24.6	24.1 25.1	4.8	4.5 5.1	254
172	166 178	207.4	187.5 227.3	67.3	63.2 71.4	2.41	1.90 2.92	4.82	4.46 5.18	25.6	25.1 26.1	6.1	5.8 6.4	512
170	164 176	226.0	206.1 245.9	71.6	67.5 75.7	2.69	2.18 3.20	4.46	4.10 4.82	24.8	24.3 25.3	4.9	4.6 5.2	513
176	170 182	221.4	201.5 241.3	70.4	66.3 74.5	2.71	2.20 3.22	4.50	4.14 4.86	25.1	24.6 25.6	4.7	4.4 5.0	514
173	167 179	216.9	197.0 236.8	69.0	64.9 73.1	2.42	1.91 2.93	4.63	4.27 4.99	24.4	23.9 24.9	4.9	4.6 5.2	54
173	167 179	219.2	199.3 239.1	70.4	66.3 74.5	2.53	2.02 3.04	4.52	4.16 4.88	24.7	24.2 25.2	5.4	5.1 5.7	270
179	173 185	215.5	195.6 235.4	70.7	66.6 74.8	2.60	2.09 3.11	4.39	4.03 4.75	25.2	24.7 25.7	4.7	4.4 5.0	271
175	169 181	212.0	192.1 231.9	68.8	64.7 72.9	2.42	1.91 2.93	4.59	4.23 4.95	24.4	23.9 24.9	4.8	4.5 5.1	273

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSSED MEAN	LSD* RANGE	RE- GRESSSED MEAN	LSD* RANGE
515	Early Hatcheries Saskatoon, Saskatchewan	WL x (RIR x LS)	Hi Layers	4.0	2.4 6.0	8.2 14.2	21.5
516	Early Hatcheries Saskatoon, Saskatchewan	LS x RIR BX	Silver and Gold	3.1	1.7 4.9	7.4 13.2	20.3
55	Eby's Poultry Farm Carrollton, Texas	WL SX	Grade #1	3.9	2.3 5.9	3.6 7.9	13.8
245	Eelman Poultry Farm Wayne, New Jersey	WL SX	FF 166	---	---	6.3 11.7	18.5
59	Erath Egg Farm Stephenville, Texas	WL SX	Erath Str. X	3.7	2.1 5.6	1.8 5.2	10.3
517	Evans, F. C. Abbotsford, Br. Columbia	WL SX	Echo Line	2.7	1.4 4.3	5.8 11.0	17.7
518	Fisher Poultry Farm Ayton, Ontario	WL SX	103	3.0	1.6 4.7	4.5 9.3	15.6
60	Fletcher Hatchery Concord, North Carolina	WL SX	FX 100	3.9	2.3 5.9	6.8 12.4	19.3
61	Ford's Leghorn Farm Lockport, New York	WL SX	Ford V 88	4.1	2.5 6.1	8.4 14.4	21.7
246	Forsgate Farms Jamesburg, New Jersey	WL SX	FF 160	---	---	6.4 11.9	18.7
258	Forsgate Farms Jamesburg, New Jersey	WL PS	Forsgate	4.2	2.5 6.2	5.8 11.1	17.8
65	Garber Poultry Breeding Farm Modesto, California	CG x WL BX	Garber	3.1	1.7 4.8	6.2 11.6	18.4
66	Garber Poultry Breeding Farm Modesto, California	WL SX	G 200	3.1	1.7 4.8	5.7 10.9	17.5
253	Garber Poultry Breeding Farm Modesto, California	WL SX	G 300	3.6	2.0 5.4	6.4 11.9	18.7
69	Garrison, Earl W. Bridgeton, New Jersey	RIR x WR BX	Golden Sex Link	4.5	2.8 6.6	8.7 14.8	22.2
255	Garrison, Earl W. Bridgeton, New Jersey	WL SX	Garrison X 300	---	---	2.4 6.2	11.6
70	Gasson's Poultry Farm Versailles, Ohio	WL SX	G 33	3.2	1.8 5.1	6.8 12.4	19.3
72	Ghostley's Poultry Farm Anoka, Minnesota	WL SX	Ghostley Pearl	3.4	1.9 5.3	7.7 13.5	20.7

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION (Days)		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST (\$)		FEED PER 24 OZ. OF EGGS PRODUCED (lbs)		EGG WEIGHT (oz)		BODY WEIGHT (lbs)		STOCK CODE
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
170	164 176	216.8	196.9 236.7	69.0	64.9 73.1	2.59	2.08 3.10	4.44	4.08 4.80	25.0	24.5 25.5	5.1	4.8 5.4	515
172	166 178	209.1	189.2 229.0	66.9	62.8 71.0	2.41	1.90 2.92	5.05	4.69 5.41	25.0	24.5 25.5	6.1	5.8 6.4	516
169	163 175	226.2	206.3 246.1	70.5	66.4 74.6	2.78	2.27 3.29	4.34	3.98 4.70	24.4	23.9 24.9	4.4	4.1 4.7	55
176	170 182	225.9	206.0 245.8	70.9	66.8 75.0	2.82	2.31 3.33	4.39	4.03 4.75	24.8	24.3 25.3	4.3	4.0 4.6	245
175	169 181	230.0	210.1 249.9	71.1	67.0 75.2	2.91	2.40 3.42	4.31	3.95 4.67	25.2	24.7 25.7	4.3	4.0 4.6	59
179	173 185	226.4	206.5 246.3	72.3	68.2 76.4	2.76	2.25 3.27	4.54	4.18 4.90	25.1	24.6 25.6	4.9	4.6 5.2	517
178	172 184	224.0	204.1 243.9	70.3	66.2 74.4	2.80	2.29 3.31	4.46	4.10 4.82	25.2	24.7 25.7	4.7	4.4 5.0	518
174	168 180	216.9	197.0 236.8	69.4	65.3 73.5	2.72	2.21 3.23	4.41	4.05 4.77	25.1	24.6 25.6	4.4	4.1 4.7	60
179	173 185	214.1	194.2 234.0	69.1	65.0 73.2	2.38	1.87 2.89	4.63	4.27 4.99	24.7	24.2 25.2	5.0	4.7 5.3	61
180	174 186	220.4	200.5 240.3	71.8	67.7 75.9	2.86	2.35 3.37	4.25	3.89 4.61	24.9	24.4 25.4	4.2	3.9 4.5	246
177	171 183	212.1	192.2 232.0	67.7	63.6 71.8	2.49	1.98 3.00	4.54	4.18 4.90	25.1	24.6 25.6	4.4	4.1 4.7	258
168	162 174	236.9	217.0 256.8	73.3	69.2 77.4	2.90	2.39 3.41	4.33	3.97 4.69	25.0	24.5 25.5	5.0	4.7 5.3	65
170	164 176	231.5	211.6 251.4	72.2	68.1 76.3	2.99	2.48 3.50	4.24	3.88 4.60	24.8	24.3 25.3	4.3	4.0 4.6	66
173	167 179	219.6	199.7 239.5	70.3	66.2 74.4	2.97	2.46 3.48	4.25	3.89 4.61	24.9	24.4 25.4	4.5	4.2 4.8	253
171	165 177	209.6	189.7 229.5	67.9	63.8 72.0	2.36	1.85 2.87	4.94	4.58 5.30	25.9	25.4 26.4	7.3	7.0 7.6	69
168	162 174	235.0	215.1 254.9	71.5	67.4 75.6	2.97	2.46 3.48	4.17	3.81 4.53	24.1	23.6 24.6	3.9	3.6 4.2	255
173	167 179	216.5	196.6 236.4	70.1	66.0 74.2	2.60	2.09 3.11	4.46	4.10 4.82	24.5	24.0 25.0	4.3	4.0 4.6	70
173	167 179	219.1	199.2 239.0	70.4	66.3 74.5	2.74	2.23 3.25	4.36	4.00 4.72	25.3	24.8 25.8	4.5	4.2 4.8	72

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
247	Goetz, Eugene Lakewood, New Jersey	WL	SX Commercial	---	---	8.9	4.2 15.0
243	Good's Poultry Farm Rt. 4, Indiana, Pennsylvania	WL	SX Good's	4.2	2.6 6.3	14.7	8.6 22.1
75	Great Plains Hatcheries Effingham, Illinois	RIR	PS Egg Master	3.7	2.2 5.6	10.2	5.2 16.7
76	Great Plains Hatcheries Effingham, Illinois		BX Golden Cross	3.5	2.0 5.3	10.2	5.2 16.7
519	Groupe Maska St. Hyacinthe, Quebec	RIR x LS	BX Maska 42	4.5	2.8 6.6	15.1	8.9 22.5
520	Groupe Oka Oka Two Mountains, Quebec	WL	SX Oka 39	3.9	2.3 5.9	10.9	5.7 17.6
78	Hall Bros. Hatchery Wallingford, Connecticut	WL	SX Commercial	3.9	2.3 5.9	16.6	10.1 24.2
79	Hall Bros. Hatchery Wallingford, Connecticut	WPR x RIR	BX Silver Hallcross	4.2	2.5 6.2	11.0	5.8 17.7
80	Hansen's Leghorn City Puyallup, Washington	WL	SX Criss Cross H 25	4.0	2.4 5.9	10.2	5.2 16.7
226	Hansen's Leghorn City Puyallup, Washington	WL	SX Criss Cross 177	3.8	2.3 5.8	13.0	7.3 20.1
83	Hansen's, P., Poultry Breeding Fr. Fresno, California	AW	BX One Grade	3.1	1.7 4.8	12.5	6.9 19.5
84	Hanson, J. A. & Son Corvallis, Oregon	WL	SX Super Nick	3.7	2.1 5.6	17.3	10.7 25.0
225	Harco Orchards & Poultry Farms South Easton, Massachusetts	RIR x BPR	BX Sex Link	2.8	1.5 4.6	12.0	6.5 18.8
88	Heisdorf & Nelson Farms Kirkland, Washington	WL	SX H & N Nick Chick	3.4	1.9 5.2	4.4	1.3 9.2
252	Heisdorf & Nelson Farms Kirkland, Washington	WL	SX H & N Mark II	2.3	1.1 3.9	8.3	3.8 14.3
275	Heisdorf & Nelson Farms Kirkland, Washington	SYN x WL	BX Breed Cross	3.1	1.7 4.8	13.8	7.9 21.0
242	Hill Top Poultry Farm Hawley, Pennsylvania	WL	SX Hill Top #285	3.7	2.1 5.6	7.7	3.4 13.5
91	Hogsett Poultry Breeding Farm Pomona, California	CG x WL	BX Hogsett	4.1	2.5 6.2	22.3	14.9 30.7

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION (Days)		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST (\$)		FEED PER 24 OZ. OF EGGS PRODUCED (lbs)		EGG WEIGHT (oz)		BODY WEIGHT (lbs)		STOCK CODE
		HEN HOUSED		HEN DAY										
		(No.)		(%)										
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
173	167 179	228.7	208.8 248.6	71.5	67.4 75.6	2.87	2.36 3.38	4.32	3.96 4.68	24.5	24.0 25.0	4.4	4.1 4.7	247
173	167 179	214.2	194.3 234.1	71.1	67.0 75.2	2.54	2.03 3.05	4.48	4.12 4.84	24.9	24.4 25.4	5.0	4.7 5.3	243
176	170 182	223.1	203.2 243.0	70.4	66.3 74.5	2.83	2.32 3.34	4.48	4.12 4.84	25.3	24.8 25.8	5.8	5.5 6.1	75
175	169 181	223.8	203.9 243.7	70.5	66.4 74.6	2.92	2.41 3.43	4.31	3.95 4.67	25.5	25.0 26.0	5.2	4.9 5.5	76
172	166 178	206.3	186.4 226.2	67.8	63.7 71.9	2.40	1.89 2.91	4.98	4.62 5.34	25.1	24.6 25.6	6.8	6.5 7.1	519
180	174 186	225.1	205.2 245.0	72.8	68.7 76.9	2.82	2.31 3.33	4.41	4.05 4.77	25.0	24.5 25.5	4.9	4.6 5.2	520
175	169 181	206.7	186.8 226.6	65.4	61.3 69.5	2.31	1.80 2.82	4.55	4.19 4.91	25.3	24.8 25.8	4.4	4.1 4.7	78
175	169 181	213.5	193.6 233.4	68.3	64.2 72.4	2.61	2.10 3.12	4.67	4.31 5.03	25.0	24.5 25.5	6.5	6.2 6.8	79
173	167 179	228.2	208.3 248.1	72.3	68.2 76.4	2.77	2.26 3.28	4.36	4.00 4.72	24.7	24.2 25.2	4.7	4.4 5.0	80
171	165 177	225.2	205.3 245.1	71.9	67.8 76.0	2.69	2.18 3.20	4.27	3.91 4.63	24.4	23.9 24.9	4.3	4.0 4.6	226
173	167 179	206.2	186.3 226.1	67.0	62.9 71.1	2.54	2.03 3.05	4.62	4.26 4.98	25.7	25.2 26.2	5.5	5.2 5.8	83
177	171 183	195.4	175.5 215.3	66.5	62.4 70.6	2.46	1.95 2.97	4.50	4.14 4.86	24.3	23.8 24.8	4.5	4.2 4.8	84
169	163 175	226.7	206.8 246.6	70.9	66.8 75.0	2.89	2.38 3.40	4.49	4.13 4.85	26.0	25.5 26.5	6.2	5.9 6.5	225
166	160 172	242.4	222.5 262.3	73.3	69.2 77.4	3.12	2.61 3.63	4.22	3.86 4.58	24.6	24.1 25.1	4.5	4.2 4.8	88
171	165 177	233.5	213.6 253.4	72.4	68.3 76.5	2.89	2.38 3.40	4.30	3.94 4.66	25.3	24.8 25.8	4.5	4.2 4.8	252
169	163 175	228.9	209.0 248.8	70.6	66.5 74.7	2.65	2.14 3.16	4.45	4.09 4.81	25.2	24.7 25.7	5.3	5.0 5.6	275
176	170 182	222.3	202.4 242.2	69.4	65.3 73.5	2.76	2.25 3.27	4.49	4.13 4.85	24.4	23.9 24.9	4.2	3.9 4.5	242
173	167 179	206.3	186.4 226.2	70.0	65.9 74.1	2.51	2.00 3.02	4.53	4.17 4.89	24.7	24.2 25.2	5.5	5.2 5.8	91

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
92	Honegger Breeder Hatchery Forrest, Illinois	WL SX	Honegger Layer	3.8	2.2 5.8	4.8 9.7	16.1
93	Honegger Breeder Hatchery Forrest, Illinois	WL SX	Honegger Layer #62	4.7	2.9 6.8	7.2 12.9	20.0
95	Hubbard Farms Walpole, New Hampshire	RIR x NH BX	H 496	3.9	2.3 5.8	8.8 14.9	22.3
97	Hy-Line Poultry Farm Des Moines, Iowa	INX	934 A	2.8	1.5 4.5	2.8 6.9	12.4
99	Hy-Line Poultry Farm Des Moines, Iowa	INX	934 C	2.1	1.0 3.6	2.6 6.5	12.0
240	Hy-Line Poultry Farm Des Moines, Iowa	INX	934 H	2.6	1.3 4.3	2.5 6.3	11.8
101	Ideal Hatchery & Poultry Farm Cameron, Texas	WL SX	H-3-W	2.8	1.5 4.5	5.4 10.5	17.0
108	Kerr, Dr., Hatcheries Minneota, Minnesota	WL IN	409 C	3.7	2.1 5.6	5.2 10.2	16.7
109	Keystone Poultry Breeding Farm Ephrata, Pennsylvania	WL SX	Keystone Leghorns	3.1	1.7 4.9	7.1 12.7	19.7
110	Kimber Farms, Inc. Fremont, California	WL SX	K 137	2.6	1.3 4.2	3.8 8.3	14.3
111	Kimber Farms, Inc. Fremont, California	WL SX	K 141	3.1	1.7 4.8	5.0 9.9	16.3
112	Kimber Farms, Inc. Fremont, California	WL SX	K 155	3.3	1.9 5.2	4.6 9.4	15.7
266	King Leghorn Farm Hatchery Thayer, Missouri	WL SX	King Line #100	4.4	2.7 6.4	5.8 11.0	17.7
263	Kingstown Poultry Farm Rt. 1, N. Kingston, Rhode Island	RIR PS	Kingstown	3.6	2.1 5.5	7.3 13.0	20.1
227	Klongland Hatchery Stoughton, Wisconsin	CG x WL BX	K Cross	3.5	2.0 5.3	2.3 6.1	11.5
113	Kruger's Poultry Breeding Farm Dinuba, California	WL SX	Commercial	3.9	2.3 5.9	10.4 17.0	24.7
521	Lambert, M. Bright, Ontario	RIR x CR BX	Gold Cross	3.8	2.2 5.7	6.6 12.1	19.0
116	Lawton, A. C. & Sons Foxboro, Massachusetts	WPR PS	Certified Candidate	3.7	2.2 5.7	4.3 9.0	15.1

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION (Days)		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST (\$)		FEED PER 24 OZ. OF EGGS PRODUCED (lbs)		EGG WEIGHT (oz)		BODY WEIGHT (lbs)		STOCK CODE
		HEN HOUSED		HEN DAY										
		RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE									
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
176	170 182	228.3	208.4 248.2	72.3	68.2 76.4	2.89	2.38 3.40	4.29	3.93 4.65	24.6	24.1 25.1	4.4	4.1 4.7	92
171	165 177	226.5	206.6 246.4	71.6	67.5 75.7	2.65	2.14 3.16	4.39	4.03 4.75	23.7	23.2 24.2	4.5	4.2 4.8	93
172	166 178	215.5	195.6 235.4	69.4	65.3 73.5	2.44	1.93 2.95	4.87	4.51 5.23	25.1	24.6 25.6	5.9	5.6 6.2	95
170	164 176	234.8	214.9 254.7	71.8	67.7 75.9	2.85	2.34 3.36	4.32	3.96 4.68	24.7	24.2 25.2	4.3	4.0 4.6	97
168	162 174	237.9	218.0 257.8	72.5	68.4 76.6	2.99	2.48 3.50	4.14	3.78 4.50	25.1	24.6 25.6	4.2	3.9 4.5	99
167	161 173	244.0	224.1 263.9	74.5	70.4 78.6	3.12	2.61 3.63	4.07	3.71 4.43	24.9	24.4 25.4	4.2	3.9 4.5	240
169	163 175	221.6	201.7 241.5	69.7	65.6 73.8	2.77	2.26 3.28	4.28	3.92 4.64	25.2	24.7 25.7	4.4	4.1 4.7	101
169	163 175	226.7	206.8 246.6	70.9	66.8 75.0	2.81	2.30 3.32	4.36	4.00 4.72	25.1	24.6 25.6	4.8	4.5 5.1	108
176	170 182	223.2	203.3 243.1	71.0	66.9 75.1	2.80	2.29 3.31	4.39	4.03 4.75	24.9	24.4 25.4	4.9	4.6 5.2	109
167	161 173	230.3	210.4 250.2	70.7	66.6 74.8	2.96	2.45 3.47	4.26	3.90 4.62	25.1	24.6 25.6	4.5	4.2 4.8	110
172	166 178	224.2	204.3 244.1	71.6	67.5 75.7	2.79	2.28 3.30	4.27	3.91 4.63	24.5	24.0 25.0	4.6	4.3 4.9	111
164	158 170	237.1	217.2 257.0	72.4	68.3 76.5	2.99	2.48 3.50	4.29	3.93 4.65	24.8	24.3 25.3	4.6	4.3 4.9	112
175	169 181	224.4	204.5 244.3	71.2	67.1 75.3	2.82	2.31 3.33	4.30	3.94 4.66	25.2	24.7 25.7	4.5	4.2 4.8	266
179	173 185	196.1	176.2 216.0	65.3	61.2 69.4	2.03	1.52 2.54	4.87	4.51 5.23	25.7	25.2 26.2	5.9	5.6 6.2	263
167	161 173	232.6	212.7 252.5	70.3	66.2 74.4	2.90	2.39 3.41	4.37	4.01 4.73	25.2	24.7 25.7	5.2	4.9 5.5	227
178	172 184	201.0	181.1 220.9	67.5	63.4 71.6	2.39	1.88 2.90	4.53	4.17 4.89	24.9	24.4 25.4	4.5	4.2 4.8	113
180	174 186	216.5	196.6 236.4	69.9	65.8 74.0	2.58	2.07 3.09	4.62	4.26 4.98	24.8	24.3 25.3	5.1	4.8 5.4	521
183	177 189	203.6	183.7 223.5	66.1	62.0 70.2	2.42	1.91 2.93	4.75	4.39 5.11	24.9	24.4 25.4	5.6	5.3 5.9	116

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
117	Lawton, A. C. & Sons Foxboro, Massachusetts	RIR x WPR BX	Buff Sex Link	2.8	1.5 4.5	3.8 8.3	14.2
235	Leader, Guy A. & Sons Rt. 2, York, Pennsylvania	WL SX	8X	3.7	2.2 5.6	5.2 10.2	16.7
229	Leader, Guy A. & Sons Rt. 2, York, Pennsylvania	WL SX	14 X	4.1	2.5 6.2	6.4 11.8	18.7
248	Lee's Poultry Farm Brookville, Ohio	WPR PS	Lee	4.6	2.9 6.8	7.4 13.2	20.3
122	Liechty's Poultry Farm Wauseon, Ohio	WL SX	L 240	3.5	2.0 5.4	5.2 10.2	16.7
522	Lone Pine Farm Berwick, Nova Scotia	RIR x LS BX	Lone Pine	3.6	2.1 5.5	9.1 15.3	22.7
124	Lux Leghorn Land Farms Hopkinton, Iowa	WL SX	H-D-6	3.6	2.1 5.5	5.5 10.6	17.2
523	Manitoba ROP Hatchery Winnipeg, Manitoba	BR x WL BX	Keyline	4.4	2.7 6.5	13.6 20.7	29.0
524	Manitoba ROP Hatchery Winnipeg, Manitoba	BR x LS BX	Keyline 230	5.9	3.9 8.2	13.5 20.6	28.9
525	Manitoba ROP Hatchery Winnipeg, Manitoba	WL SX	Keyline 110	4.4	2.7 6.4	8.2 14.1	21.4
126	Mathews Poultry Farm Burlington, Wisconsin	WL SX	M 138	4.2	2.6 6.3	5.2 10.3	16.8
133	Merryknoll Farms Attleboro, Massachusetts	BX	Merryknoll 400	3.5	2.0 5.3	7.1 12.7	19.7
134	Midwest Poultry Farm Marshall, Missouri	WL PS	Best Egg Grade	3.2	1.8 5.0	5.2 10.2	16.7
135	Midwest Poultry Farm Marshall, Missouri	RIR PS	Production Red	3.5	2.0 5.4	6.7 12.2	19.1
262	Minear Hatchery New Providence, Iowa	WL SX	Minear M	4.4	2.7 6.5	9.5 15.8	23.4
136	Missouri Valley Hatchery Marshall, Missouri	WL PS	Best Egg Contest	3.8	2.3 5.8	5.2 10.2	16.7
137	Missouri Valley Hatchery Marshall, Missouri	BX	Ski Line Layers	3.5	2.0 5.3	6.7 12.2	19.1
139	Niles Poultry Breeding Farm Niles, California	WL SX	Niles	3.1	1.7 4.8	2.9 6.9	12.6

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION (Days)		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST (\$)		FEED PER 24 OZ. OF EGGS PRODUCED (lbs)		EGG WEIGHT (oz)		BODY WEIGHT (lbs)		STOCK CODE
		HEN HOUSED		HEN DAY										
		(No.)		(%)										
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
178	172 184	220.7	200.8 240.6	68.4	64.3 72.5	2.75	2.24 3.26	4.64	4.28 5.00	25.9	25.4 26.4	6.0	5.7 6.3	117
173	167 179	224.0	204.1 243.9	70.2	66.1 74.3	2.80	2.29 3.31	4.47	4.11 4.83	24.9	24.4 25.4	4.8	4.5 5.1	235
176	170 182	209.3	189.4 229.2	67.6	63.5 71.7	2.43	1.92 2.94	4.59	4.23 4.95	25.1	24.6 25.6	4.5	4.2 4.8	229
171	165 177	204.3	184.4 224.2	65.9	61.8 70.0	2.02	1.51 2.53	5.38	5.02 5.74	25.3	24.8 25.8	6.6	6.3 6.9	248
177	171 183	217.5	197.6 237.4	69.2	65.1 73.3	2.57	2.06 3.08	4.57	4.21 4.93	24.9	24.4 25.4	4.1	3.8 4.4	122
187	181 193	198.1	178.2 218.0	66.9	62.8 71.0	2.33	1.82 2.84	5.11	4.75 5.47	25.0	24.5 25.5	6.2	5.9 6.5	522
173	167 179	224.5	204.6 244.4	70.9	66.8 75.0	2.73	2.22 3.24	4.40	4.04 4.76	24.8	24.3 25.3	4.7	4.4 5.0	124
173	167 179	189.7	169.8 209.6	64.9	60.8 69.0	2.08	1.57 2.59	4.97	4.61 5.33	25.1	24.6 25.6	5.1	4.8 5.4	523
173	167 179	187.9	168.0 207.8	66.3	62.2 70.4	1.97	1.46 2.48	5.25	4.89 5.61	25.0	24.5 25.5	6.3	6.0 6.6	524
170	164 176	208.8	188.9 228.7	67.6	63.5 71.7	2.51	2.00 3.02	4.42	4.06 4.78	25.5	25.0 26.0	4.5	4.2 4.8	525
176	170 182	220.8	200.9 240.7	69.1	65.0 73.2	2.66	2.15 3.17	4.49	4.13 4.85	25.3	24.8 25.8	4.7	4.4 5.0	126
179	173 185	209.2	189.3 229.1	66.8	62.7 70.9	2.42	1.91 2.93	4.83	4.47 5.19	25.7	25.2 26.2	6.2	5.9 6.5	133
172	166 178	218.6	198.7 238.5	69.1	65.0 73.2	2.68	2.17 3.19	4.48	4.12 4.84	24.9	24.4 25.4	4.5	4.2 4.8	134
176	170 182	214.4	194.5 234.3	68.8	64.7 72.9	2.58	2.07 3.09	4.73	4.37 5.09	24.9	24.4 25.4	5.8	5.5 6.1	135
176	170 182	208.4	188.5 228.3	68.9	64.8 73.0	----	----	----	----	23.9	23.4 24.4	4.7	4.4 5.0	262
171	165 177	225.4	205.5 245.3	70.7	66.6 74.8	2.83	2.32 3.34	4.34	3.98 4.70	25.0	24.5 25.5	4.5	4.2 4.8	136
171	165 177	214.3	194.4 234.2	68.4	64.3 72.5	2.56	2.05 3.07	4.55	4.19 4.91	25.1	24.6 25.6	4.6	4.3 4.9	137
174	168 180	217.5	197.6 237.4	68.9	64.8 73.0	2.67	2.16 3.18	4.42	4.06 4.78	25.1	24.6 25.6	4.5	4.2 4.8	139

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
140	Niles Poultry Breeding Farm Niles, California	CG x WL BX	Commercial	3.7	2.1 5.6	11.4	6.1 18.2
526	Noble Bros. Orangeville, Ontario	WL SX	N-60	3.9	2.3 5.9	10.6	5.4 17.1
527	Nolin, E. Victoriaville, Quebec	WL SX	Nolin 41	3.7	2.2 5.6	10.9	5.7 17.5
142	Norco Poultry Breeding Farm Norco, California	WL PS	Grade A	3.7	2.1 5.6	12.7	7.0 19.7
143	Norris, Vernon Valencia, Pennsylvania	WL PS	Efficiency Leghorns	3.7	2.2 5.6	11.4	6.1 18.2
257	North Central Regional Lab. Lafayette, Indiana	RIR PS	Random Bred Red	4.2	2.6 6.2	13.6	7.7 20.7
157	North Central Regional Lab. Lafayette, Indiana	RIR x WL BX	Random Bred Cross	3.1	1.7 4.8	13.6	7.8 20.8
120	North Iowa Hatcheries Osage, Iowa		BX Lanco 404	3.8	2.3 5.8	11.0	5.8 17.7
528	Ontario Agricultural College Guelph, Ontario	WL SX	Strain Cross	3.1	1.7 4.9	11.1	5.8 17.8
145	Ottawa Central Experimental Farm Ottawa, Ontario	WL PS	Random Bred	3.8	2.2 5.7	14.7	8.6 22.1
228	Parmenter Reds Franklin, Massachusetts	RIR SX	PM 1	4.2	2.5 6.2	13.7	7.8 20.9
239	Parmenter Reds Franklin, Massachusetts	DW x RIR BX	Massachusetts White	3.6	2.1 5.5	16.0	9.7 23.6
150	Peerless Hatchery Spencer, Iowa	WL SX	Commercial	4.0	2.4 6.0	14.0	8.1 21.3
151	Peerless Hatchery Spencer, Iowa	WL SX	Peerless 262	4.0	2.4 6.0	12.2	6.7 19.1
152	Penna. Farm Bureau Hatchery Harrisburg, Pennsylvania	WL SX	LSC 55	3.8	2.3 5.8	12.4	6.8 19.4
234	Penna. Farm Bureau Hatchery Harrisburg, Pennsylvania	WL SX	LSC 60	3.1	1.7 4.9	9.4	4.6 15.7
154	Pillsbury Company Clinton, Iowa	WL SX	Maxi-Lay Queens	3.5	2.0 5.3	11.9	6.4 18.7
529	Purdy, Miss H. M. Balcarres, Saskatchewan	BR x (LS x BR)	Heavy Cross	4.5	2.8 6.6	20.8	13.7 29.1

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION (Days)		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST (\$)		FEED PER 24 OZ. OF EGGS PRODUCED (lbs)		EGG WEIGHT (oz)		BODY WEIGHT (lbs)		STOCK CODE
		HEN HOUSED (No.)		HEN DAY (%)										
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
171	165 177	224.3	204.4 244.2	70.9	66.8 75.0	2.63	2.12 3.14	4.56	4.20 4.92	25.2	24.7 25.7	5.4	5.1 5.7	140
176	170 182	224.2	204.3 244.1	70.2	66.1 74.3	2.74	2.23 3.25	4.47	4.11 4.83	24.8	24.3 25.3	4.5	4.2 4.8	526
176	170 182	221.8	201.9 241.7	70.3	66.2 74.4	2.72	2.21 3.23	4.46	4.10 4.82	25.0	24.5 25.5	4.6	4.3 4.9	527
174	168 180	211.1	191.2 231.0	68.8	64.7 72.9	2.52	2.01 3.03	4.56	4.20 4.92	25.0	24.5 25.5	4.7	4.4 5.0	142
178	172 184	213.9	194.0 233.8	68.6	64.5 72.7	2.52	2.01 3.03	4.44	4.08 4.80	24.7	24.2 25.2	4.1	3.8 4.4	143
176	170 182	202.1	182.2 222.0	64.7	60.6 68.8	1.89	1.38 2.40	5.31	4.95 5.67	24.4	23.9 24.9	6.2	5.9 6.5	257
173	167 179	200.2	180.3 220.1	65.4	61.3 69.5	2.15	1.64 2.66	4.88	4.52 5.24	24.3	23.8 24.8	5.4	5.1 5.7	157
173	167 179	220.7	200.8 240.6	69.6	65.5 73.7	2.70	2.19 3.21	4.56	4.20 4.92	25.1	24.6 25.6	5.3	5.0 5.6	120
176	170 182	216.1	196.2 236.0	68.8	64.7 72.9	2.73	2.22 3.24	4.36	4.00 4.72	25.0	24.5 25.5	4.0	3.7 4.3	528
182	176 188	202.9	183.0 222.8	67.9	63.8 72.0	2.13	1.62 2.64	4.80	4.44 5.16	24.0	23.5 24.5	4.6	4.3 4.9	145
178	172 184	210.8	190.9 230.7	67.2	63.1 71.3	2.44	1.93 2.95	4.74	4.38 5.10	25.0	24.5 25.5	5.7	5.4 6.0	228
172	166 178	208.9	189.0 228.8	70.2	66.1 74.3	2.42	1.91 2.93	4.59	4.23 4.95	25.2	24.7 25.7	6.3	6.0 6.6	239
179	173 185	218.7	198.8 238.6	70.6	66.5 74.7	2.58	2.07 3.09	4.53	4.17 4.89	24.5	24.0 25.0	4.8	4.5 5.1	150
175	169 181	226.5	206.6 246.4	71.6	67.5 75.7	2.77	2.26 3.28	4.41	4.05 4.77	24.7	24.2 25.2	4.8	4.5 5.1	151
171	165 177	218.7	198.8 238.6	68.9	64.8 73.0	2.63	2.12 3.14	4.44	4.08 4.80	25.1	24.6 25.6	4.5	4.2 4.8	152
173	167 179	231.6	211.7 251.5	71.6	67.5 75.7	2.95	2.44 3.46	4.32	3.96 4.68	24.9	24.4 25.4	4.7	4.4 5.0	234
177	171 183	218.4	198.5 238.3	70.6	66.5 74.7	2.61	2.10 3.12	4.41	4.05 4.77	25.2	24.7 25.7	4.4	4.1 4.7	154
176	170 182	184.9	165.0 204.8	65.0	60.9 69.1	2.04	1.53 2.55	5.15	4.79 5.51	25.3	24.8 25.8	6.3	6.0 6.6	529

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING (%)		LAYING (%)	
				RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
159	Randall Hatchery & Breeding Farm Montclair, California	CG x WL BX	Randall	3.9	2.3 5.9	7.1 12.7	19.7
274	Randall Hatchery & Breeding Farm Montclair, California	RIR SX	Randall	4.8	3.1 7.0	4.3 9.1	15.3
160	Rapp Leghorn Farm Farmingdale, New Jersey	WL SX	Rapp Linecross	4.3	2.6 6.4	4.7 9.5	15.8
530	Raynor, Ralph Charlottetown, P. E. I.	WL SX	Raynor R-60	3.0	1.6 4.8	7.4 13.1	20.2
164	Richardson Poultry Breeding Farm Redlands, California	WA BX	Commercial	4.6	2.9 6.7	7.8 13.7	20.9
165	Richardson Poultry Breeding Farm Redlands, California	WA BX	Commercial MWA	3.7	2.1 5.6	8.3 14.3	21.6
249	Riddle Spring Poultry Farm Manchester, New Hampshire	 BX	Super-Triway	3.9	2.3 5.8	5.9 11.2	17.9
531	Scattered Acres Hatchery Rt. 3, Hanover, Ontario	WL x (BLxLS)	Hanover 30	2.8	1.5 4.6	5.5 10.6	17.2
175	Schaible, Louis D. Shiloh, New Jersey	WL SX	Commercial	4.1	2.5 6.1	6.3 11.7	18.5
176	Schaible, Louis D. Shiloh, New Jersey	WL SX	Commercial 2	3.5	2.0 5.4	6.3 11.7	18.5
241	Schaible, Louis D. Shiloh, New Jersey	RIR PS	Schaible	4.7	3.0 6.9	7.8 13.6	20.8
178	Schildmeyer's Poultry Breeding Fr. Orange, California	CG x WL BX	Commercial	3.7	2.1 5.6	6.7 12.3	19.2
180	Schuyler Poultry Farms LeRoy, New York	WL SX	Egg Champs	4.0	2.4 5.9	4.3 9.0	15.1
181	Shaver Poultry Breeding Farm Galt, Ontario	WL SX	Starcross 288	3.5	2.0 5.4	3.7 8.1	14.0
236	Shaver Poultry Breeding Farm Galt, Ontario	WL SX	3-W	3.3	1.9 5.2	6.8 12.3	19.3
183	Sierra Farms Hatchery Riverside, California	CG x WL BX	Silver Gray	3.9	2.3 5.9	3.7 8.1	14.1
532	Smyth, James Nanaimo, Br. Columbia	WL SX	Smyth	4.1	2.5 6.1	5.4 10.6	17.1
533	Starline Breeders Hatchery Saskatoon, Saskatchewan	CG x WL BX	Pearlette	2.4	1.2 4.0	4.4 9.1	15.3

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST		FEED PER 24 OZ. OF EGGS PRODUCED		EGG WEIGHT		BODY WEIGHT		STOCK CODE
(Days)		HEN HOUSED (No.)		HEN DAY (%)		(\$)		(lbs)		(oz)		(lbs)		
RE- GRESSSED MEAN	LSD* RANGE	RE- GRESSSED MEAN	LSD* RANGE	RE- GRESSSED MEAN	LSD* RANGE	RE- GRESSSED MEAN	LSD* RANGE	RE- GRESSSED MEAN	LSD* RANGE	RE- GRESSSED MEAN	LSD* RANGE	RE- GRESSSED MEAN	LSD* RANGE	
170	164 176	229.6	209.7 249.5	72.2	68.1 76.3	2.67	2.16 3.18	4.39	4.03 4.75	24.8	24.3 25.3	5.2	4.9 5.5	159
171	165 177	227.0	207.1 246.9	70.7	66.6 74.8	2.65	2.14 3.16	4.59	4.23 4.95	25.0	24.5 25.5	5.9	5.6 6.2	274
177	171 183	220.9	201.0 240.8	70.1	66.0 74.2	2.63	2.12 3.14	4.48	4.12 4.84	24.9	24.4 25.4	4.3	4.0 4.6	160
172	166 178	214.9	195.0 234.8	69.6	65.5 73.7	2.57	2.06 3.08	4.48	4.12 4.84	25.1	24.6 25.6	4.8	4.5 5.1	530
171	165 177	225.9	206.0 245.8	72.1	68.0 76.2	2.61	2.10 3.12	4.48	4.12 4.84	23.9	23.4 24.4	5.4	5.1 5.7	164
172	166 178	219.6	199.7 239.5	70.8	66.7 74.9	2.62	2.11 3.13	4.48	4.12 4.84	25.1	24.6 25.6	4.7	4.4 5.0	165
175	169 181	212.4	192.5 232.3	67.4	63.3 71.5	2.50	1.99 3.01	4.81	4.45 5.17	25.4	24.9 25.9	6.2	5.9 6.5	249
175	169 181	220.0	200.1 239.9	69.7	65.6 73.8	2.70	2.19 3.21	4.50	4.14 4.86	25.3	24.8 25.8	4.8	4.5 5.1	531
176	170 182	215.6	195.9 235.5	69.1	65.0 73.2	2.63	2.12 3.14	4.40	4.04 4.76	25.0	24.5 25.5	4.3	4.0 4.6	175
173	167 179	218.2	198.3 238.1	69.5	65.4 73.6	2.55	2.04 3.06	4.59	4.23 4.95	25.0	24.5 25.5	4.7	4.4 5.0	176
173	167 179	214.8	194.9 234.7	68.9	64.8 73.0	2.45	1.94 2.96	4.75	4.39 5.11	25.1	24.6 25.6	5.7	5.4 6.0	241
168	162 174	224.7	204.8 244.6	70.4	66.3 74.5	2.58	2.07 3.09	4.59	4.23 4.95	24.7	24.2 25.2	5.3	5.0 5.6	178
174	168 180	212.9	193.0 232.8	68.0	63.9 72.1	2.46	1.95 2.97	4.68	4.32 5.04	24.9	24.4 25.4	4.5	4.2 4.8	180
176	170 182	234.3	214.4 254.2	74.2	70.1 78.3	3.01	2.50 3.52	4.30	3.94 4.66	25.4	24.9 25.9	4.8	4.5 5.1	181
173	167 179	214.7	194.8 234.6	68.8	64.7 72.9	2.60	2.09 3.11	4.46	4.10 4.82	24.7	24.2 25.2	4.5	4.2 4.8	236
170	164 176	230.8	210.9 250.7	72.2	68.1 76.3	2.69	2.18 3.20	4.42	4.06 4.78	25.0	24.5 25.5	5.3	5.0 5.6	183
175	169 181	217.6	197.7 237.5	69.4	65.3 73.5	2.43	1.92 2.94	4.72	4.36 5.08	24.4	23.9 24.9	5.0	4.7 5.3	532
171	165 177	234.7	214.8 254.6	71.2	67.1 75.3	2.89	2.38 3.40	4.46	4.10 4.82	25.0	24.5 25.5	5.6	5.3 5.9	533

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
190	Stone's Poultry Farm Dinuba, California	WL	H 56	3.1	1.7 4.8	5.6 10.8	17.4
251	Stone Bros. Hatchery Madelia, Minnesota	WL	Stone 158	2.9	1.5 4.6	5.6 10.8	17.5
196	Sunnyside Hatchery Watertown, Wisconsin	CG x WL BX	Wisco White	3.3	1.9 5.1	5.4 10.6	17.1
197	Swift & Co. Chicago, Illinois	WL	Ski-Hi 316	3.2	1.7 4.9	4.9 9.8	16.2
199	Townline Poultry Farm Zeeland, Michigan	WL	SC 30	3.9	2.3 5.8	4.2 8.9	15.0
534	Triska, Eric Edmonton, Alberta	WL	Belmont 292 A	3.6	2.1 5.5	6.3 11.7	18.5
535	Triska, Eric Edmonton, Alberta	WL	Belmont 292 B	3.2	1.8 5.0	6.3 11.8	18.6
231	Truway Farms East Berlin, Pennsylvania	WL	Trubred #21	3.3	1.8 5.1	6.7 12.3	19.2
201	University of Missouri Columbia, Missouri	WL	Intra Flock	4.5	2.8 6.6	7.1 12.7	19.7
202	Vancrest Farms Hyde Park, New York	BX	All Red	3.7	2.2 5.7	8.4 14.4	21.7
260	Vancrest Farms Hyde Park, New York	WL	MB	3.6	2.1 5.5	6.2 11.6	18.4
261	Ward Poultry Farm Independence, Iowa	BX	Wardcrost 356	3.1	1.7 4.8	4.7 9.5	15.9
42	Warren, J. J. North Brookfield, Massachusetts	WL	Warren-Darby DX	3.0	1.6 4.7	9.0 15.1	22.6
43	Warren, J. J. North Brookfield, Massachusetts	WL	Warren-Darby Pure	4.1	2.5 6.1	5.0 10.0	16.4
208	Warren, J. J. North Brookfield, Massachusetts	RIR x RIW BX	Sex-Sal-Link	3.7	2.2 5.6	7.0 12.6	19.6
250	Warren, J. J. North Brookfield, Massachusetts	WL x SYN BX	Warren J-J	3.7	2.1 5.6	7.9 13.8	21.1
210	Webster Poultry Farms Auburn, New York	RIR	Certified	3.7	2.2 5.7	4.9 9.8	16.2
272	Wells, George E. & Son, Inc. New Milford, Connecticut	RIR x BPR BX	Black Sex-Link	3.1	1.7 4.8	7.1 12.8	19.8

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST		FEED PER 24 OZ. OF EGGS PRODUCED		EGG WEIGHT		BODY WEIGHT		STOCK CODE
		HEN HOUSED		HEN DAY										
(Days)		(No.)		(%)		(\$)		(lbs)		(oz)		(lbs)		
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
170	164 176	225.2	205.3 245.1	70.9	66.8 75.0	2.86	2.35 3.37	4.33	3.97 4.69	25.3	24.8 25.8	4.7	4.4 5.0	190
168	162 174	225.2	205.3 245.1	70.4	66.3 74.5	2.83	2.32 3.34	4.29	3.93 4.65	25.0	24.5 25.5	4.5	4.2 4.8	251
173	167 179	228.0	208.1 247.9	71.2	67.1 75.3	2.77	2.26 3.28	4.41	4.05 4.77	24.8	24.3 25.3	5.2	4.9 5.5	196
175	169 181	235.9	216.0 255.8	74.3	70.2 78.4	2.99	2.48 3.50	4.24	3.88 4.60	25.4	24.9 25.9	4.7	4.4 5.0	197
176	170 182	220.6	200.7 240.5	69.7	65.6 73.8	2.62	2.11 3.13	4.52	4.16 4.88	24.6	24.1 25.1	4.3	4.0 4.6	199
176	170 182	227.3	207.4 247.2	72.5	68.4 76.6	2.83	2.32 3.34	4.43	4.07 4.79	25.0	24.5 25.5	4.9	4.6 5.2	534
178	172 184	225.4	205.5 245.3	71.8	67.7 75.9	2.76	2.25 3.27	4.50	4.14 4.86	24.8	24.3 25.3	5.2	4.9 5.5	535
177	171 183	208.5	188.6 228.4	67.8	63.7 71.9	2.48	1.97 2.99	4.56	4.20 4.92	25.4	24.9 25.9	4.4	4.1 4.7	231
174	168 180	219.2	199.3 239.1	69.9	65.8 74.0	2.56	2.05 3.07	4.53	4.17 4.89	24.8	24.3 25.3	4.8	4.5 5.1	201
183	177 189	210.5	190.6 230.4	68.6	64.5 72.7	2.48	1.97 2.99	4.83	4.47 5.19	24.9	24.4 25.4	5.6	5.3 5.9	202
174	168 180	221.6	201.7 241.5	70.7	66.6 74.8	2.78	2.27 3.29	4.40	4.04 4.76	25.1	24.6 25.6	4.3	4.0 4.6	260
175	169 181	218.5	198.6 238.4	68.8	64.7 72.9	2.54	2.03 3.05	4.55	4.19 4.91	24.9	24.4 25.4	4.6	4.3 4.9	261
177	171 183	212.4	192.5 232.3	70.0	65.9 74.1	2.54	2.03 3.05	4.52	4.16 4.88	24.8	24.3 25.3	4.5	4.2 4.8	42
175	169 181	226.5	206.6 246.4	71.2	67.1 75.3	2.95	2.44 3.46	4.33	3.97 4.69	25.2	24.7 25.7	4.5	4.2 4.8	43
184	178 190	210.3	190.4 230.2	69.2	65.1 73.3	2.53	2.02 3.04	4.52	4.16 4.88	25.5	25.0 26.0	5.4	5.1 5.7	208
176	170 182	219.9	200.0 239.8	71.6	67.5 75.7	2.66	2.15 3.17	4.42	4.06 4.78	24.5	24.0 25.0	4.3	4.0 4.6	250
179	173 185	218.0	198.1 237.9	69.5	65.4 73.6	2.67	2.16 3.18	4.68	4.32 5.04	24.8	24.3 25.3	5.6	5.3 5.9	210
180	174 186	204.0	184.1 223.9	66.7	62.6 70.8	2.19	1.68 2.70	5.25	4.89 5.61	25.0	24.5 25.5	6.1	5.8 6.4	272

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	BREEDER'S NAME AND ADDRESS	BREEDING	STRAIN OR TRADENAME	MORTALITY			
				GROWING		LAYING	
				(%)		(%)	
				RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
211	Welp's Breeding Farm Bancroft, Iowa	INX	341	3.1	1.7 4.8	12.6	7.0 19.6
212	Welp's Breeding Farm Bancroft, Iowa	WL SX	901	3.5	2.0 5.4	11.7	6.3 18.5
217	Wirtz Bros. Leghorn Farm Lebanon, New Jersey	WL LX	Linecross	4.0	2.4 6.0	11.2	5.9 17.8
219	Wood Poultry Breeding Farm Pomona, California	AW BX	Commercial	3.1	1.7 4.8	10.2	5.2 16.7

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

AGE AT 50% PRODUCTION (Days)		EGG PRODUCTION				INCOME OVER FEED AND CHICK COST (\$)		FEED PER 24 OZ. OF EGGS PRODUCED (lbs)		EGG WEIGHT (oz)		BODY WEIGHT (lbs)		STOCK CODE
		HEN HOUSED		HEN DAY										
		(No.)		(%)										
RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	
171	165 177	224.5	204.6 244.4	70.9	66.8 75.0	2.63	2.12 3.14	4.36	4.00 4.72	24.7	24.2 25.2	4.1	3.8 4.4	211
171	165 177	224.0	204.1 243.9	70.4	66.3 74.5	----	----	----	----	24.9	24.4 25.4	4.3	4.0 4.6	212
178	172 184	213.5	193.6 233.4	67.5	63.4 71.6	2.45	1.94 2.96	4.64	4.28 5.00	25.0	24.5 25.5	4.6	4.3 4.9	217
170	164 176	223.6	203.7 243.5	70.0	65.9 74.1	2.54	2.03 3.05	4.59	4.23 4.95	24.5	24.0 25.0	5.0	4.7 5.3	219

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
3	Allstate LX 330	78.2	75.3 81.1	1.0	0.2 2.2	1.3	0.3 3.0	.5	0.0 2.9	1.5	0.0 5.4	13.7	13.4 14.0
264	Ames W-40 Royal	76.8	73.9 79.7	1.2	.3 2.6	1.3	.3 2.9	.4	.0 2.6	.7	.0 3.8	14.3	14.0 14.6
5	Ames 424	78.2	75.3 81.1	1.5	.5 2.9	1.9	.7 3.7	.6	.0 3.1	.2	.0 2.5	14.0	13.7 14.3
7	Ames 434 R	74.2	71.3 77.1	.8	.1 1.9	1.2	.3 2.7	.7	.0 3.3	.8	.0 4.0	13.8	13.5 14.1
8	Ames 505	77.0	74.1 79.9	1.3	.4 2.6	1.5	.4 3.1	20.0	12.9 28.2	27.3	18.1 37.6	14.0	13.7 14.3
267	Ames #525	74.7	71.8 77.6	3.1	1.6 5.1	2.8	1.2 4.9	.4	.0 2.6	32.9	23.0 43.6	14.0	13.7 14.3
502	Andrews 813	77.0	74.1 79.9	.9	.2 2.1	1.5	.4 3.2	.1	.0 1.8	.8	.0 4.1	14.1	13.8 14.4
10	Anthony WL	79.8	76.9 82.7	1.3	.4 2.7	1.1	.2 2.5	1.2	.0 4.2	.6	.0 3.5	13.6	13.3 13.9
503	Appleby Life Line	79.2	76.3 82.1	1.1	.3 2.4	1.7	.5 3.4	1.0	.0 3.9	1.4	.0 5.2	14.0	13.7 14.3
138	Arbor Acres Queen	80.4	77.5 83.3	1.7	.6 3.2	2.3	.9 4.2	.2	.0 2.1	.6	.0 3.5	13.8	13.5 14.1
238	Arbor Acres Queen B	79.9	77.0 82.8	2.1	.9 3.8	2.7	1.2 4.8	.5	.0 2.8	.5	.0 3.3	13.8	13.5 14.1
504	Arnold Cream Egg Layer	75.6	72.7 78.5	2.4	1.1 4.1	2.9	1.3 5.1	3.0	.6 7.2	4.5	1.1 10.2	13.8	13.5 14.1
11	Avery WR x RIR	----	----	---	---	---	---	---	---	---	---	----	----
232	Avery Candidate Mating	73.7	70.8 76.6	1.7	.7 3.3	2.0	.7 3.9	11.4	6.0 18.2	16.5	9.2 25.5	13.4	13.1 13.7
13	Babcock Bessie	78.7	75.8 81.6	1.6	.6 3.1	1.7	.5 3.5	.3	.0 2.4	1.1	.0 4.6	14.0	13.7 14.3
237	Babcock Bonnie	77.2	74.3 80.1	1.0	.2 2.2	1.0	.2 2.5	.4	.0 2.7	.6	.0 3.6	13.8	13.5 14.1
15	Bagby One Grade	78.7	75.8 81.6	1.2	.3 2.6	1.3	.3 2.9	.4	.0 2.6	.7	.0 3.8	13.5	13.2 13.8
505	Balakshin WL	78.3	75.4 81.2	1.9	.8 3.5	1.8	.6 3.5	.5	.0 2.9	.9	.0 4.2	13.8	13.5 14.1

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
259	Ball #591	76.7	73.8 79.6	1.5	0.5 3.0	1.3	0.3 2.8	--	--	--	--	14.1	13.8 14.4
233	Ball #592	76.9	74.0 79.8	2.2	.9 3.9	2.2	.8 4.1	.5	0.0 2.8	.5	0.0 3.3	13.8	13.5 14.1
265	Ballew Bee Line #99	76.5	73.6 79.4	1.2	.3 2.6	1.3	.3 2.9	.4	.0 2.6	.7	.0 3.8	13.8	13.5 14.1
269	Baumgartner #408	78.8	75.9 81.7	2.6	1.3 4.5	3.8	2.0 6.2	.4	.0 2.6	.7	.0 3.8	13.7	13.4 14.0
20	Beamsdale 66	77.0	74.1 79.9	1.2	.3 2.5	1.4	.4 3.0	.4	.0 2.7	.6	.0 3.5	13.7	13.4 14.0
22	Booth Line 351	78.1	75.2 81.0	1.2	.3 2.5	2.3	.9 4.2	.6	.0 3.1	.8	.0 4.1	13.7	13.4 14.0
268	Booth Super Star	78.9	76.0 81.8	2.6	1.2 4.4	2.9	1.3 5.1	.4	.0 2.6	.7	.0 3.8	13.6	13.3 13.9
230	Brender's Money Maker #1	77.1	74.2 80.0	1.3	.4 2.6	1.5	.4 3.2	.7	.0 3.3	.3	.0 2.8	14.1	13.8 14.4
506	Buchanan's Kanaka White	75.5	72.6 78.4	1.4	.4 2.8	2.3	.9 4.2	1.0	.0 3.9	2.7	.3 7.4	13.9	13.6 14.2
26	Bundesen Graycie	75.8	72.9 78.7	1.3	.4 2.7	1.7	.5 3.4	.1	.0 1.9	.3	.0 2.9	13.2	12.9 13.5
29	Cameron DMX	79.3	76.4 82.2	1.5	.5 3.0	1.7	.5 3.4	.5	.0 2.8	2.2	.1 6.5	13.8	13.5 14.1
30	Carey Nicks	80.4	77.5 83.3	.8	.1 2.0	.9	.1 2.2	.4	.0 2.6	1.3	.0 4.9	14.0	13.7 14.3
31	Cashman Hi-Cash	77.4	74.5 80.3	1.9	.8 3.5	2.1	.8 4.0	.8	.0 3.5	.7	.0 3.7	13.9	13.6 14.2
32	Childers CG x WL	76.6	73.7 79.5	1.0	.3 2.3	1.7	.5 3.4	.5	.0 2.8	.3	.0 2.9	13.6	13.3 13.9
507	Clark's 41	76.6	73.7 79.5	2.6	1.3 4.5	3.8	2.0 6.2	7.6	3.3 13.4	14.1	7.3 22.6	14.0	13.7 14.3
508	Clark's Paymaster 101	75.3	72.4 78.2	2.8	1.4 4.7	5.6	3.3 8.4	11.0	5.7 17.7	14.3	7.5 22.9	13.5	13.2 13.8
34	Colonial Best Egg Grade	79.0	76.1 81.9	1.2	.3 2.6	1.3	.3 2.9	.4	.0 2.6	.7	.0 3.8	14.0	13.7 14.3
35	Colonial True Line 365	79.4	76.5 82.3	2.8	1.4 4.7	3.3	1.6 5.6	.9	.0 3.6	.8	.0 4.0	13.7	13.4 14.0

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
501	Co-Op Paramount Columbia X	77.1	74.2 80.0	2.8	1.4 4.7	4.7	2.6 7.4	3.0	0.6 7.1	10.8	4.9 18.5	13.7	13.4 14.0
37	Cornell Random Bred	77.4	74.5 80.3	1.5	.5 3.0	1.8	.6 3.5	.6	.0 3.0	.7	.0 3.7	13.7	13.4 14.0
509	Couvoir 98	76.0	73.1 78.9	2.6	1.3 4.5	2.1	.8 4.0	.5	.0 2.8	.3	.0 2.8	13.9	13.6 14.2
510	Couvoir Corvette	80.9	78.0 83.8	1.5	.5 2.9	2.1	.8 4.0	0.0	.0 1.0	0.0	.0 1.6	13.8	13.5 14.1
511	Dawson Series 1000	76.7	73.8 79.6	1.3	.4 2.7	2.2	.8 4.1	2.8	.5 6.8	3.1	.4 8.1	13.8	13.5 14.1
45	DeKalb 101	77.7	74.8 80.6	1.0	.2 2.2	1.3	.3 2.9	.9	.0 3.6	1.1	.0 4.6	13.8	13.5 14.1
48	DeKalb 131	78.9	76.0 81.8	1.3	.4 2.7	1.2	.3 2.7	.5	.0 2.8	.9	.0 4.2	13.8	13.5 14.1
256	Del Rio RIR	76.3	73.4 79.2	1.0	.2 2.3	2.9	1.3 5.1	8.0	3.6 14.0	8.3	3.3 15.4	13.3	13.0 13.6
51	Demler One Grade	78.9	76.0 81.8	1.6	.5 3.0	2.0	.7 3.9	.1	.0 1.9	1.1	.0 4.5	13.9	13.6 14.2
52	Demler Kross	75.2	72.3 78.1	1.6	.6 3.1	2.4	1.0 4.4	.3	.0 2.4	.5	.0 3.4	13.5	13.2 13.8
254	Demler IBX	76.7	73.8 79.6	1.4	.4 2.8	2.0	.7 3.9	.4	.0 2.5	.6	.0 3.7	13.9	13.6 14.2
512	Deverill Keyline 403	78.1	75.2 81.0	2.0	.8 3.6	3.9	2.0 6.4	7.3	3.1 13.1	8.7	3.5 15.8	13.8	13.5 14.1
513	de Zeeuw 601	78.5	75.6 81.4	1.5	.5 3.0	2.5	1.0 4.5	0.0	.0 1.3	.4	.0 3.2	13.9	13.6 14.2
514	deZeeuw 752	76.4	73.5 79.3	1.2	.4 2.6	1.4	.4 3.0	.1	.0 1.8	.6	.0 3.5	14.0	13.7 14.3
54	Drake One Grade	77.6	74.7 80.5	.8	.1 2.0	1.5	.4 3.2	---	---	---	---	13.6	13.3 13.9
270	Dryden Gray X Leghorn	75.1	72.2 78.0	1.8	.7 3.4	2.0	.7 3.9	1.4	.0 4.6	1.2	.0 4.7	13.6	13.3 13.9
271	Dryden SX 60	77.8	74.9 80.7	1.4	.5 2.9	2.0	.7 3.9	.1	.0 1.7	.6	.0 3.4	13.9	13.6 14.2
273	Dryden SX 72	76.9	74.0 79.8	2.5	1.2 4.3	2.8	1.3 5.0	.1	.0 1.9	.5	.0 3.4	13.7	13.4 14.0

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
515	Early Hi Layer	76.8	73.9 79.7	1.5	0.5 2.9	2.3	0.9 4.2	3.3	0.7 7.6	2.8	0.3 7.5	14.1	13.8 14.4
516	Early Silver and Gold	77.5	74.6 80.4	2.1	.9 3.8	4.6	2.5 7.2	3.6	.9 8.0	8.1	3.2 15.1	14.0	13.7 14.3
55	Eby's Grade #1	78.4	75.5 81.3	3.6	1.9 5.6	4.1	2.2 6.6	.2	.0 2.1	.6	.0 3.5	13.9	13.6 14.2
245	Eelman FF 166	78.2	75.3 81.1	1.3	.4 2.7	1.4	.4 3.1	---	---	---	---	13.6	13.3 13.9
59	Erath Str. X	78.0	75.1 80.9	2.3	1.1 4.1	2.3	.9 4.3	.7	.0 3.2	.6	.0 3.6	13.9	13.6 14.2
517	Evans Echo Line	77.2	74.3 80.1	1.7	.6 3.2	2.4	1.0 4.4	.2	.0 2.0	1.7	.0 5.7	13.7	13.4 14.0
518	Fisher 103	78.1	75.2 81.0	2.0	.9 3.7	2.1	.8 4.0	.3	.0 2.4	.8	.0 4.0	13.9	13.6 14.2
60	Fletcher FX 100	78.4	75.5 81.3	1.7	.6 3.2	1.8	.6 3.6	.5	.0 2.9	.7	.0 3.7	14.1	13.8 14.4
61	Ford's V 88	76.9	74.0 79.8	2.8	1.4 4.6	3.6	1.8 6.0	.5	.0 2.8	2.3	.1 6.8	14.0	13.7 14.3
246	Forsgate FF 160	80.5	77.6 83.4	2.6	1.2 4.4	1.4	.4 3.1	---	---	---	---	13.4	13.1 13.7
258	Forsgate WL	80.6	77.7 83.5	1.2	.4 2.6	2.3	.9 4.3	.5	.0 2.8	.5	.0 3.3	13.6	13.3 13.9
65	Garber CG x WL	78.1	75.2 81.0	.4	.3 1.3	1.2	.3 2.8	.4	.0 2.7	.6	.0 3.6	13.7	13.4 14.0
66	Garber G 200	80.9	78.0 83.8	.9	.2 2.2	1.9	.6 3.7	.1	.0 1.6	.3	.0 2.9	13.9	13.6 14.2
253	Garber G 300	79.9	77.0 82.8	.8	.1 2.0	1.5	.5 3.2	.2	.0 2.1	.3	.0 2.8	13.8	13.5 14.1
69	Garrison Golden Sex Link	78.2	75.3 81.1	.8	.2 2.0	2.0	.7 3.9	.5	.0 2.8	10.1	4.4 17.6	13.9	13.6 14.2
255	Garrison X 300	76.3	73.4 79.2	2.8	1.4 4.7	.7	.1 2.0	---	---	---	---	13.9	13.6 14.2
70	Gasson's G 33	80.1	77.2 83.0	1.8	.7 3.3	1.5	.4 3.2	.1	.0 1.9	.6	.0 3.5	13.9	13.6 14.2
72	Ghostley Pearl	80.4	77.5 83.3	1.3	.4 2.6	1.6	.5 3.3	.2	.0 2.0	.6	.0 3.5	13.9	13.6 14.2

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
247	Goetz Commercial	79.8	76.9 82.7	1.8	0.7 3.4	2.2	0.8 4.1	---	---	---	---	13.6	13.3 13.9
243	Good's WL	79.6	76.7 82.5	1.7	.6 3.2	1.1	.2 2.7	.5	0.0 2.8	2.2	0.1 6.5	13.9	13.6 14.2
75	Great Plains Egg Master	76.9	74.0 79.8	1.2	.3 2.6	4.4	2.4 7.0	5.1	1.7 10.2	36.0	25.8 46.9	13.8	13.5 14.1
76	Great Plains Golden Cross	78.0	75.1 80.9	1.2	.3 2.6	2.7	1.2 4.8	7.5	3.2 13.3	36.4	26.2 47.3	13.8	13.5 14.1
519	Groupe Maska 42	75.3	72.4 78.2	1.4	.5 2.8	3.6	1.8 6.0	8.6	4.0 14.7	10.3	4.6 17.9	13.8	13.5 14.1
520	Groupe Oka 39	77.8	74.9 80.7	1.8	.7 3.4	2.0	.7 3.9	1.1	.0 4.0	.9	.0 4.2	13.9	13.6 14.2
78	Hall Bros. Commercial	78.5	75.6 81.4	1.9	.8 3.5	2.6	1.1 4.7	.1	.0 1.9	.7	.0 3.7	13.9	13.6 14.2
79	Hall Bros. Silver Hallcross	76.6	73.7 79.5	1.1	.3 2.3	2.3	.9 4.3	---	---	---	---	13.8	13.5 14.1
80	Hansen's Criss Cross H25	78.1	75.2 81.0	1.5	.5 3.0	1.8	.6 3.6	.6	.0 3.0	.6	.0 3.5	13.8	13.5 14.1
226	Hansen's Criss Cross 177	76.2	73.3 79.1	.9	.2 2.1	6.1	3.7 9.1	.6	.0 3.1	1.2	.0 4.9	13.8	13.5 14.1
83	Hansen's One Grade	71.9	69.0 74.8	1.3	.4 2.7	1.6	.5 3.4	5.2	1.7 10.2	6.3	2.1 12.8	14.2	13.9 14.5
84	Hanson Super Nick	78.4	75.5 81.3	1.9	.8 3.5	2.3	.9 4.3	.1	.0 1.9	.5	.0 3.2	13.6	13.3 13.9
225	Harco Orchards Sex Link	76.4	73.5 79.3	1.2	.3 2.5	2.0	.7 3.9	17.3	10.6 25.1	24.4	15.6 34.5	13.3	13.0 13.6
88	H & N Nick Chick	80.4	77.5 83.3	1.3	.4 2.7	2.0	.7 3.8	.2	.0 2.0	.6	.0 3.7	13.8	13.5 14.1
252	H & N Mark II	81.0	78.1 83.9	1.0	.2 2.2	1.1	.2 2.6	.4	.0 2.6	.8	.0 4.1	13.5	13.2 13.8
275	H & N Breed Cross	76.8	73.9 79.7	.9	.2 2.2	1.7	.5 3.4	.2	.0 2.2	.3	.0 2.9	13.3	13.0 13.6
242	Hill Top # 285	79.4	76.5 82.3	2.0	.8 3.6	2.0	.7 3.9	.5	.0 2.8	.5	.0 3.3	13.8	13.5 14.1
91	Hogsett CG x WL	74.7	71.8 77.6	1.1	.3 2.4	1.4	.4 3.0	.4	.0 2.5	.5	.0 3.2	13.3	13.0 13.6

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
92	Honegger Layer	78.2	75.3 81.1	1.3	0.4 2.7	1.8	0.6 3.6	0.2	0.0 1.9	0.4	0.0 3.1	13.8	13.5 14.1
93	Honegger Layer #62	79.5	76.6 82.4	1.0	.3 2.3	1.4	.3 3.0	.1	.0 1.8	.4	.0 3.2	14.0	13.7 14.3
95	Hubbard H 496	77.7	74.8 80.6	.9	.2 2.1	1.4	.4 3.0	18.7	11.8 26.7	23.2	14.6 33.0	13.2	12.9 13.5
97	Hy-Line 934 A	77.5	74.6 80.4	1.8	.7 3.3	1.6	.5 3.4	.3	.0 2.3	.2	.0 2.6	13.9	13.6 14.2
99	Hy-Line 934 C	73.9	71.0 76.8	1.0	.2 2.3	1.8	.6 3.6		.0 1.1	.3	.0 2.7	13.8	13.5 14.1
240	Hy-Line 934 H	73.9	71.0 76.8	.7	.1 1.7	.9	.1 2.3	.1	.0 1.6	.1	.0 2.3	13.7	13.4 14.0
101	Ideal H-3-W	78.3	75.4 81.2	1.7	.6 3.2	1.8	.6 3.5	.1	.0 1.8	.6	.0 3.5	13.8	13.5 14.1
108	Kerr 409 C	77.2	74.3 80.1	1.2	.3 2.6	2.7	1.2 4.8	.4	.0 2.6	5.5	1.6 11.6	14.0	13.7 14.3
109	Keystone Leghorns	77.5	74.6 80.4	1.5	.5 2.9	1.8	.6 3.6	.5	.0 2.8	1.9	.0 6.0	13.8	13.5 14.1
110	Kimber K 137	80.8	77.9 83.7	1.5	.5 3.0	2.0	.7 3.9	.5	.0 2.8	.9	.0 4.1	14.2	13.9 14.5
111	Kimber K 141	78.2	75.3 81.1	1.5	.5 3.0	2.1	.8 4.1	.4	.0 2.5	.6	.0 3.5	13.9	13.6 14.2
112	Kimber K 155	79.8	76.9 82.7	.9	.2 2.1	1.6	.5 3.3	.8	.0 3.5	.6	.0 3.6	14.0	13.7 14.3
266	King Line #100	77.5	74.6 80.4	2.4	1.1 4.2	1.3	.3 2.9	.4	.0 2.6	5.5	1.6 11.6	14.0	13.7 14.3
263	Kingstown RIR	79.5	76.6 82.4	1.4	.5 2.9	2.2	.9 4.2	17.6	10.9 25.4	26.3	17.2 36.5	13.8	13.5 14.1
227	Klongland K Cross	75.6	72.7 78.5	1.2	.3 2.5	1.7	.5 3.4	.9	.0 3.6	2.1	.1 6.5	13.5	13.2 13.8
113	Kruger's Commercial	76.1	73.2 79.0	2.5	1.2 4.3	2.9	1.3 5.0	.2	.0 2.1	.6	.0 3.6	13.9	13.6 14.2
521	Lambert Gold Cross	77.7	74.8 80.6	2.1	.9 3.7	3.6	1.8 6.0	8.5	3.9 14.6	11.9	5.7 20.0	13.7	13.4 14.0
116	Lawton Certified Cand.	75.2	72.3 78.1	.8	.1 2.0	2.1	.8 4.0	---	---	---	---	13.8	13.5 14.1

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugb units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
117	Lawton Buff Sex Link	75.6	72.7 78.5	1.3	0.4 2.7	1.5	0.4 3.2	20.9	13.7 29.2	30.8	21.2 41.4	13.8	13.5 14.1
235	Leader 8X	78.6	75.7 81.5	1.5	.5 3.0	1.7	.5 3.5	.5	.0 2.8	.5	.0 3.3	13.7	13.4 14.0
229	Leader 14 X	80.2	77.3 83.1	1.5	.5 3.0	1.2	.3 2.7	2.0	.2 5.6	.5	.0 3.3	13.8	13.5 14.1
248	Lee's WPR	76.7	73.8 79.6	2.1	.9 3.8	2.7	1.2 4.8	7.8	3.5 13.7	12.0	5.8 20.0	13.9	13.6 14.2
122	Liechty's L 240	78.0	75.1 80.9	2.4	1.1 4.2	3.4	1.6 5.7	.4	.0 2.6	.7	.0 3.8	14.0	13.7 14.3
522	Lone Pine RIR x LS	78.1	75.2 81.0	2.0	.8 3.6	3.3	1.6 5.6	6.6	2.7 12.2	12.5	6.2 20.7	14.1	13.8 14.4
124	Lux H-D-6	76.5	73.6 79.4	.8	.1 1.9	1.8	.6 3.6	.2	.0 2.1	.6	.0 3.6	13.9	13.6 14.2
523	Manitoba Keyline	75.4	72.5 78.3	1.6	.6 3.2	2.7	1.2 4.9	6.6	2.6 12.1	5.4	1.5 11.5	13.9	13.6 14.2
524	Manitoba Keyline 230	73.8	70.9 76.7	2.4	1.1 4.2	4.0	2.1 6.5	7.0	2.9 12.7	11.5	5.5 19.5	14.0	13.7 14.3
525	Manitoba Keyline 110	78.1	75.2 81.0	1.6	.6 3.1	1.9	.7 3.8	1.5	.0 1.5	.9	.0 4.2	13.7	13.4 14.0
126	Mathews M 138	78.1	75.2 81.0	2.1	.9 3.8	2.7	1.2 4.8	.4	.0 2.7	.7	.0 3.8	13.9	13.6 14.2
133	Merryknoll 400	----	----	---	---	---	---	---	---	---	---	----	----
134	Midwest Best Egg Grade	79.0	76.1 81.9	1.2	.3 2.6	2.7	1.2 4.8	.4	.0 2.6	5.5	1.6 11.6	14.2	13.9 14.5
135	Midwest Production Red	77.5	74.6 80.4	1.2	.3 2.6	1.3	.3 2.9	10.4	5.3 17.0	40.3	29.8 51.3	13.5	13.2 13.8
262	Minear M	79.5	76.6 82.4	---	---	---	---	---	---	---	---	13.6	13.3 13.9
136	Missouri Valley Best Egg Contest	79.3	76.4 82.2	1.2	.3 2.6	2.7	1.2 4.8	.4	.0 2.6	.7	.0 3.8	13.8	13.5 14.1
137	Missouri Valley Ski Line Layers	79.0	76.1 81.9	2.5	1.1 4.2	4.1	2.2 6.6	.4	.0 2.6	5.6	1.6 11.7	14.2	13.9 14.5
139	Niles WL	78.4	75.5 81.3	1.6	.6 3.1	1.9	.7 3.7	.3	.0 2.4	.8	.0 3.9	14.0	13.7 14.3

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STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
140	Niles Commercial	75.3	72.4 78.2	1.0	0.2 2.3	2.1	0.8 4.0	0.2	0.0 2.0	0.7	0.0 3.9	13.4	13.1 13.7
526	Noble N-60	75.6	72.7 78.5	1.8	.7 3.4	2.2	.9 4.2	0.0	.0 .9	.3	.0 2.8	13.8	13.5 14.1
527	Nolin 41	77.1	74.2 80.0	1.4	.5 2.8	2.2	.8 4.1	0.0	.0 1.5	.7	.0 3.7	13.8	13.5 14.1
142	Norco Grade A	79.7	76.8 82.6	1.7	.6 3.2	2.1	.8 4.1	.2	.0 2.1	.7	.0 3.9	13.7	13.4 14.0
143	Norris Efficiency Leghorns	80.5	77.6 83.4	1.6	.6 3.1	1.7	.5 3.5	.5	.0 2.8	.5	.0 3.3	13.7	13.4 14.0
257	No. Cent. Regional Random Bred Red	78.0	75.1 80.9	1.4	.5 2.8	1.6	.5 3.3	19.4	12.4 27.6	20.7	12.6 30.3	13.5	13.2 13.8
157	No. Cent. Regional Random Bred Cross	76.8	73.9 79.7	1.1	.3 2.4	1.8	.6 3.6	10.0	5.0 16.4	11.6	5.5 19.6	13.7	13.4 14.0
120	North Iowa Lanco 404	72.1	69.2 75.0	3.1	1.6 5.1	3.5	1.7 5.9	.4	.0 2.6	.7	.0 3.8	14.0	13.7 14.3
528	Ontario Agr. College Strain Cross	77.4	74.5 80.3	1.2	.3 2.5	2.0	.7 3.8	.1	.0 1.6	.3	.0 2.8	13.6	13.3 13.9
145	Ottawa Cent. Expt. Random Bred	79.2	76.3 82.1	1.6	.6 3.1	2.3	.9 4.3		.0 1.3	.5	.0 3.4	13.7	13.4 14.0
228	Parmenter Reds PM 1	78.1	75.2 81.0	.8	.1 1.9	1.3	.3 2.9	15.4	9.2 23.0	24.5	15.7 34.5	13.4	13.1 13.7
239	Parmenter Reds Mass. White	78.0	75.1 80.9	2.1	.9 3.8	1.1	.2 2.7	.5	.0 2.8	7.2	2.6 13.9	14.0	13.7 14.3
150	Peerless Commercial	78.1	75.2 81.0	3.0	1.5 4.9	1.3	.3 2.9	.4	.0 2.6	.7	.0 3.8	13.9	13.6 14.2
151	Peerless 262	78.3	75.4 81.2	1.2	.3 2.6	2.7	1.2 4.8	.4	.0 2.6	.7	.0 3.8	13.8	13.5 14.1
152	Penna. F. B. LSC 55	80.7	77.8 83.6	2.1	.9 3.8	2.2	.8 4.1	.5	.0 2.8	.5	.0 3.3	13.9	13.6 14.2
234	Penna. F. B. LSC 60	81.0	78.1 83.9	2.2	.9 3.9	1.7	.5 3.4	.5	.0 2.8	1.7	.0 5.8	13.8	13.5 14.1
154	Pillsbury Maxi-Lay Queens	80.0	77.1 82.9	2.0	.8 3.6	1.6	.5 3.3	.1	.0 1.8	.7	.0 3.8	14.1	13.8 14.4
529	Purdy Heavy Cross	76.7	73.8 79.6	1.9	.8 3.6	3.4	1.7 5.8	10.0	5.0 16.5	11.7	5.6 19.7	13.8	13.5 14.1

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All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
159	Randall CG x WL	75.3	72.4 78.2	0.8	0.1 1.9	1.6	0.5 3.4	0.2	0.0 2.0	0.3	0.0 2.9	13.5	13.2 13.8
274	Randall RIR	77.0	74.1 79.9	.8	.1 1.9	1.4	.4 3.0	20.6	13.4 28.8	20.2	12.2 29.8	13.2	12.9 13.5
160	Rapp Linecross	78.5	75.6 81.4	1.2	.4 2.6	1.5	.4 3.2	.9	.0 3.6	.4	.0 3.0	13.8	13.5 14.1
530	Raynor R-60	78.3	75.4 81.2	1.7	.6 3.2	2.3	.9 4.3	.5	.0 2.9	1.1	.0 4.6	13.8	13.5 14.1
164	Richardson Commercial	74.7	71.8 77.6	.9	.2 2.2	1.7	.5 3.4	3.9	1.1 8.5	4.0	.8 9.5	14.0	13.7 14.3
165	Richardson Commercial MWA	73.9	71.0 76.8	1.2	.3 2.5	1.7	.5 3.5	3.1	.6 7.3	4.1	.9 9.6	14.2	13.9 14.5
249	Riddle Spring Super-Triway	78.0	75.1 80.9	.6	.1 1.7	1.7	.6 3.5	20.7	13.5 29.0	28.5	19.2 38.9	13.9	13.6 14.2
531	Scattered Acres Hanover 30	77.3	74.4 80.2	1.9	.8 3.5	2.3	.9 4.3	1.4	.0 4.5	1.0	.0 4.4	13.9	13.6 14.2
175	Schaible Commercial	79.6	76.7 82.5	1.6	.6 3.1	1.4	.4 3.1	.4	.0 2.6	.2	.0 2.4	14.0	13.7 14.3
176	Schaible Commercial 2	77.2	74.3 80.1	1.2	.3 2.6	3.6	1.8 6.0	.4	.0 2.6	.7	.0 3.8	13.9	13.6 14.2
241	Schaible RIR	79.0	76.1 81.9	1.4	.4 2.8	2.3	.9 4.2	3.8	1.0 8.3	6.7	2.3 13.3	13.5	13.2 13.8
178	Schildmeyer's Commercial	73.9	71.0 76.8	1.3	.4 2.7	2.2	.8 4.1	.8	.0 3.5	1.0	.0 4.3	13.4	13.1 13.7
180	Schuyler Egg Champs	77.9	75.0 80.8	1.8	.7 3.4	1.9	.6 3.7	---	---	---	---	13.9	13.6 14.2
181	Shaver Starcross 288	77.9	75.0 80.8	1.7	.6 3.2	1.9	.7 3.8	.3	.0 2.3	.6	.0 3.5	14.1	13.8 14.4
236	Shaver 3-W	78.5	75.6 81.4	.8	.2 2.0	2.0	.7 3.9	.5	.0 2.8	.5	.0 3.3	14.0	13.7 14.3
183	Sierra Silver Gray	74.9	72.0 77.8	1.5	.5 3.0	2.2	.8 4.1	.3	.0 2.3	.5	.0 3.4	13.5	13.2 13.8
532	Smyth WL	74.4	71.5 77.3	3.0	1.5 4.9	3.7	1.9 6.1	.4	.0 2.5	1.6	.0 5.6	13.9	13.6 14.2
533	Starline Pearlette	76.1	73.2 79.0	1.0	.2 2.3	2.0	.7 3.9	1.5	.0 4.7	.6	.0 3.5	13.8	13.5 14.1

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS	
				1/8 INCH OR MORE		LESS THAN 1/8 INCH		1/8 INCH OR MORE		LESS THAN 1/8 INCH			
		(Haugh units)		(%)		(%)		(%)		(%)		(1/1000 inch)	
		RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE	RE-GRESSED MEAN	LSD* RANGE
190	Stone's H 56	78.8	75.9 81.7	0.7	0.1 1.7	1.6	0.5 3.3	0.1	0.0 1.9	0.3	0.0 2.9	14.2	13.9 14.5
251	Stone Bros. 158	78.0	75.1 80.9	---	---	---	---	---	---	---	---	13.9	13.6 14.2
196	Sunnyside Wisco White	74.1	71.2 77.0	.9	.2 2.1	1.8	.6 3.6	.7	.0 3.2	1.0	.0 4.5	13.7	13.4 14.0
197	Swift & Co. Ski-Hi 316	78.0	75.1 80.9	1.2	.3 2.5	2.1	.8 4.0	.8	.0 3.4	.8	.0 4.0	13.9	13.6 14.2
199	Townline SC 30	78.3	75.4 81.2	1.1	.3 2.4	3.1	1.4 5.3	.4	.0 2.6	.5	.0 3.3	13.6	13.3 13.9
534	Triska Belmont 292 A	76.3	73.4 79.2	1.8	.7 3.3	2.7	1.2 4.8	1.0	.0 3.9	1.6	.0 5.5	13.8	13.5 14.1
535	Triska Belmont 292 B	78.2	75.3 81.1	1.7	.6 3.2	1.6	.5 3.4	.7	.0 3.2	.6	.0 3.5	13.7	13.4 14.0
231	Truway Trubred #21	80.1	77.2 83.0	1.6	.6 3.2	2.1	.8 4.0	.5	.0 2.8	.5	.0 3.3	13.8	13.5 14.1
201	Univ. of Missouri Intra Flock	76.7	73.8 79.6	1.2	.3 2.6	2.7	1.2 4.9	.4	.0 2.6	.7	.0 3.8	14.1	13.8 14.4
202	Vancrest All Red	83.0	80.1 85.9	1.8	.7 3.3	2.5	1.1 4.6	---	---	---	---	13.5	13.2 13.8
260	Vancrest MB	77.4	74.5 80.3	1.8	.7 3.4	2.3	.9 4.3	---	---	---	---	14.0	13.7 14.3
261	Ward Wardcrost 356	77.0	74.1 79.9	2.7	1.3 4.6	3.1	1.4 5.3	.4	.0 2.6	.7	.0 3.8	13.6	13.3 13.9
42	Warren-Darby DX	77.7	74.8 80.6	1.3	.4 2.7	2.3	.9 4.2	.1	.0 1.6	.8	.0 4.0	14.0	13.7 14.3
43	Warren-Darby Pure	79.1	76.2 82.0	1.6	.6 3.1	2.5	1.1 4.6	.6	.0 3.1	.6	.0 3.7	13.8	13.5 14.1
208	Warren Sex-Sal-Link	78.9	76.0 81.8	.6	1.6	1.4	.4 3.0	13.5	7.6 20.7	16.5	9.2 25.4	13.2	12.9 13.5
250	Warren J-J	77.2	74.3 80.1	1.3	.4 2.7	1.8	.6 3.6	.4	.0 2.5	1.0	.0 4.4	13.9	13.6 14.2
210	Webster Certified	79.8	76.9 82.7	1.1	.3 2.4	1.4	.4 3.0	---	---	---	---	13.4	13.1 13.7
272	Wells Black Sex-Link	----	----	---	---	---	---	---	---	---	---	----	----

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

All Stocks Entered, with Regressed Means and LSD Range for each Trait, (Cont'd.)

STOCK CODE	STRAIN OR TRADENAME	ALBUMEN QUALITY (Haugh units)		BLOOD SPOTS				MEAT SPOTS				SHELL THICKNESS (1/1000 inch)	
				1/8 INCH OR MORE (%)		LESS THAN 1/8 INCH (%)		1/8 INCH OR MORE (%)		LESS THAN 1/8 INCH (%)			
		RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE	RE- GRESSED MEAN	LSD* RANGE
211	Welp's 341	78.3	75.4 81.2	1.9	0.8 3.6	1.8	0.6 3.5	0.2	0.0 2.0	0.8	0.0 4.0	13.6	13.3 13.9
212	Welp's 901	77.7	74.8 80.6	---	---	---	---	---	---	---	---	13.6	13.3 13.9
217	Wirtz Bros. Linecross	79.2	76.3 82.1	1.5	.5 3.0	2.6	1.1 4.7	2.1	.2 5.8	.5	.0 3.3	14.2	13.9 14.5
219	Wood Commercial	78.7	75.8 81.6	.4	1.2	1.4	.4 3.1	5.3	1.8 10.4	7.5	2.7 14.3	13.9	13.6 14.2

* If the regressed mean of another stock falls within this LSD range, these two stocks are not significantly different at the 5% level.

Stocks Entered in 1960-61 Random Sample Egg Production Tests
(Listed alphabetically and showing tests entered)

Stock Code	Breeder	Stock	No. Entries	Alta.	Ariz.	Br. Col.	Calif.	Cent. Can.	Fla.	Iowa	Minn.	Mo.	N. H.	N. J.	C. N. Y.	W. N. Y.	N. C.	Penn.	R. I.	Tenn.	Texas	Wisc.
3	All State	LX 330	4													X				X		X
264	Ames	W-40 Royal	1									X									X	
5	Ames	Ames 424	1																		X	
7	Ames	Ames 434R	9			X	X			X				X				X		X	X	X
8	Ames	Ames 505	4				X						X									
267	Ames	Ames 525	1									X										
502	Andrews	813	2					X														
10	Anthony	Anthony	5									X						X				
503	Appleby	Life Line	2			X		X														
138	Arbor Acres	Queen	14			X	X		X	X		X	X	X	X	X	X	X			X	X
238	Arbor Acres	Queen B	1			X												X				
504	Arnold	Cream Egg Layer	2			X																
11	Avery	Avery	1										X									
232	Avery	Candidate	1																			
13	Babcock	Bessie	14				X		XX	X		X		X	X		X	X	X	X	X	X
237	Babcock	Bonnie	7				X		X			X						X				
15	Bagby	One Grade	1									X						X			X	
505	Balakshin	Balakshin	2			X		X				X						X			X	
259	Ball	Ball 591	2													X						
233	Ball	Ball 592	1															X				
265	Ballew	Bee Line 99	1									X										
269	Baumgartner	#408	1									X										
20	Beamsdale	Beamsdale 66	2									X					X					
22	Booth	Booth Line 351	2									X										
268	Booth	Super Star	1									X										X
230	Brender	Money Maker #1	8									X								X		
506	Buchanan	Kanaka White	2			X		X										X			X	
26	Bundesen	Graycie	1				X											X				
29	Cameron	DMX	1															X				
30	Carey	Carey Nicks	3									X						X				
31	Cashman	Hi-Cash	7			X						X						X		X	X	X
32	Childers	Childers	1				X											X				
507	Clark (N. B.)	Clark's 41	1					X														
508	Clark (Man.)	Paymaster 101	2	X				X														
34	Colonial	Best Egg Grade	1									X										
35	Colonial	True Line 365	9				X			X		X					X	X		X	X	
501	Co-op	Paramount Col.	1	X								X										

Stocks Entered in 1960-61 Random Sample Egg Production Tests (Cont'd.)
(Listed alphabetically and showing tests entered)

Stock Code	Breeder	Stock	No. Entries	Alta.	Ariz.	Br. Col.	Calif.	Cent. Can.	Fla.	Iowa	Minn.	Mo.	N. H.	N. J.	C. N. Y.	W. N. Y.	N. C.	Penna.	R. I.	Tenn.	Texas	Wisc.
37	Cornell	Random Bred	11				X		X			X			X	X	X	X		X		X
509	Couvoir	98	1																			
510	Couvoir	Corvette	1					X														
511	Dawson	Series 1000	1					X														
45	DeKalb	DeKalb 101	6				X	X	X		X											
48	DeKalb	DeKalb 131	12				X		X	X	X				X		X	X		X		X
256	Del Rio	Del Rio	1							X		X										
51	Demler	One Grade	1		X																	
52	Demler	Demler Kross	1				X															
254	Demler	Demler IBX	4			X	X												X		X	
512	Deverill	Keyline 403	1					X														
513	deZeeuw	deZeeuw 601	3	X		X		X														
514	deZeeuw	deZeeuw 752	1	X																		
54	Drake	One Grade	1											X								
270	Dryden	Gray X Leghorn	1					X														
271	Dryden	SX 60	2				X															
273	Dryden	SX 72	1				X															
515	Early	Hi Layers	1				X	X														
516	Early	Silver & Gold	2	X		X																
55	Eby	Grade #1	2																			
245	Eelman	FF 166	1									X									X	
59	Erath	Erath	1																		X	
517	Evans	Echo Line	3	X		X		X														
518	Fisher	Fisher 103	1					X														
60	Fletcher	FX 100	1														X					
61	Ford	Ford V88	2													X		X				
246	Foragate	FF 160	1											X								
258	Foragate	Foragate	2												X			X				
65	Garber	Garber	1				X															
66	Garber	G 200	1				X															
253	Garber	G 300	2															X				
69	Garrison	Golden Sex-Link	1				X											X				
255	Garrison	Garrison X 300	1										X					X				
70	Gasson	G 33	3																	X		
72	Ghostley	Pearl	15				X		XX	X			X		X		X	X		X		X
247	Goetz	Commercial	1											X								
243	Good	Good	1															X				

Stocks Entered in 1960-61 Random Sample Egg Production Tests (Cont'd.)
(Listed alphabetically and showing tests entered)

Stock Code	Breeder	Stock	No. Entries	Alta.	Ariz.	Br. Col.	Calif.	Cent. Can.	Fla.	Iowa	Minn.	Mo.	N. H.	N. J.	C. N. Y.	W. N. Y.	N. C.	Penna.	R. I.	Tenn.	Texas	Wisc.
75	Great Plains	Egg Master	1																			
76	Great Plains	Golden Cross	1																			
519	Groupe Maska	Maska 42	1					X														
520	Groupe Oka	Oka 39	1					X														
78	Hall	Commercial	2															X				
79	Hall	Silver Hallcross	1													X						
80	Hansen (Wash.)	Criss Cross H25	6				X								X							X
226	Hansen (Wash.)	Criss Cross 177	2		X																	
83	Hansen (Calif.)	One Grade	1				X															
84	Hanson	Super Nick	1				X															
225	Harco	Sex Link	4																			
88	H & N	Nick Chick	11		X		X		X	X	X	X	X			X	X			XX	X	X
252	H & N	Mark II	10		X		X		X	X	X	X	X							X	X	
275	H & N	Breed Cross	1				X															
242	Hill Top	Hill Top 285	1															X				
91	Hoggett	Hoggett	1				X															
92	Honegger	Honegger Layer	16	X			X															
93	Honegger	Honegger Layer 62	3																			
95	Hubbard	H 496	5				X															
97	Hy-Line	Hy-Line 934 A	1																			X
99	Hy-Line	Hy-Line 934 C	8				X		X	X	X	X	X	X	X	X		X	X	X	XXX	X
240	Hy-Line	Hy-Line 934 H	17		XX		X		XX	X	X	X	X	X	X	X		X	X	X	XXX	
101	Ideal	H-3-W	12				X															
108	Kerr	409 C	1				X															
109	Keystone	Keystone Leghorn	2																			
110	Kimber	K 137	13		X		X		XX			X	X		X		X	X				X
111	Kimber	K 141	1				X															X
112	Kimber	K 155	11		X				X	X	X	X		X								X
266	King	King Line 100	1																			
263	Kingstown	Kingstown	1																X			
227	Klongland	K Cross	1																			X
113	Kruger	Commercial	1																			
521	Lambert	Gold Cross	1				X															
116	Lawton	Certified Cand.	1																			
117	Lawton	Buff Sex Link	2										X			X						
235	Leader	8X	1															X				
229	Leader	14X	3											X				X				

Stocks Entered in 1960-61 Random Sample Egg Production Tests (Cont'd.)
(Listed alphabetically and showing tests entered)

Stock Code	Breeder	Stock	No. Entries	Alta.	Ariz.	Br. Col.	Calif.	Cent. Can.	Fla.	Iowa	Minn.	Mo.	N. H.	N. J.	C. N. Y.	W. N. Y.	N. C.	Penna.	R. I.	Tenn.	Texas	Wisc.
248	Lee	Lee	1									X						X				
122	Liechty	L 240	1																			
522	Lone Pine	Lone Pine	1					X				X										X
124	Lux	H-D-6	2																			
523	Manitoba	Keyline	1					X														
524	Manitoba	Keyline 230	1					X														
525	Manitoba	Keyline 110	2			X		X														X
126	Mathews	M 138	1																			
133	Merryknoll	Merryknoll 400	1										X									
134	Midwest	Best Egg Grade	1									X										
135	Midwest	Prod. Red	1									X										
262	Miner	Miner M	1							X												
136	Missouri Valley	Best Egg Contest	1									X										
137	Missouri Valley	Ski Line Layers	1									X										
139	Niles	Niles	1				X															
140	Niles	Commercial	1				X															
526	Noble	N-60	1					X														
527	Nolin	Nolin	1					X														
142	Norco	Grade A	1				X															
143	Norris	Efficiency Leghorns	1															X				
157	N. Cen. Reg. Lab.	Random Bred - Cr.	1				X												X			
257	N. Cen. Reg. Lab.	Random Bred - Red	1																			
120	North Iowa	Lanco 404	1									X										
528	Ontario	Strain Cross	1			X																
145	Ottawa	Random Bred	4	X				XX								X						
228	Parmenter	PM #1	4													X	X	X	X			
239	Parmenter	Mass. White	1																			
150	Peerless	Commercial	1									X										
151	Peerless	Peerless 262	1									X										
152	Penna. F. B.	LSC 55	2																			
234	Penna. F. B.	LSC 60	1						XX											X		
154	Pillsbury	Maxi-Lay Queen	4																			
529	Purdy	Heavy Cross	1					X														
159	Randall	Randall	1				X															
274	Randall	Randall	1				X															
160	Rapp	Rapp Linecross	9					X						X	X		X	X		X		X
530	Raynor	Raynor R-60	1					X														X

Stocks Entered in 1960-61 Random Sample Egg Production Tests (Cont'd.)
(Listed alphabetically and showing tests entered)

Stock Code	Breeder	Stock	No. Entries	Alta.	Ariz.	Br. Col.	Calif.	Cent. Can.	Fla.	Iowa	Minn.	Mo.	N. H.	N. J.	C. N. Y.	W. N. Y.	N. C.	Penn.	R. I.	Tenn.	Texas	Wisc.
164	Richardson	Commercial	1				X															
165	Richardson	Commercial MWA	1				X															
249	Riddle Spring	Super-Triway	2				X						X						X			
531	Scattered Acres	Hanover	1					X														
175	Schaible	Commercial	7											X				X	X			
176	Schaible	Commercial 2	1									X										
241	Schaible	Schaible	1															X				
178	Schildmeyer	Commercial	1				X															
180	Schuyler	Egg Champs	1													X		X				
181	Shaver	Starcross 288	9	X		X	X	X				X						X	X			
236	Shaver	3-W	1																			
183	Sierra	Silver Gray	1				X															
532	Smyth	Smyth	1			X																
533	Starline	Pearlette	1					X														
190	Stone (Calif.)	H-56	1				X															
251	Stone (Minn.)	Stone 158	1																			
196	Sunnyside	Wisco White	1								X											
197	Swift	Ski-Hi 316	3								X										X	X
199	Townline	SC 30	2									X						X				
534	Triska	Belmont 292A	2	X				X														
535	Triska	Belmont 292B	1	X																		
231	Truway	Trubred #21	2																			
201	Univ. of Missouri	Intra Flock	1									X			X			X				
202	Vancrest	All Red	1													X						
260	Vancrest	MB	1																			
261	Ward	Wardcros 356	2							X		X							X			
42	Warren	Warren Darby DX	3									X										
43	Warren	Warren Darby Pure	3									X						X				
208	Warren	Sex-Sal-Link	6				X			X		X										
250	Warren	Warren JJ	5				X											X		X		
210	Webster	Certified	1																			
272	Wells	Black Sex-Link	1																			
271	Welp	Welp 341	1				X						X									
212	Welp	Welp 901	1																			
217	Wirtz	Linecross	3							X												
219	Wood	Commercial	1				X											X				

INTRODUCTION

The performance of each entry in the 1960-61 Random Sample Egg Production Tests is reported as the quartile-rank of the entry for the trait measured. These rankings are determined in the following manner. For each trait the entries in each test are aligned in descending order from the most desirable to the least desirable performance. The "mean" or average performance for the trait is then determined. All entries above the mean are in quartile 1 or 2 and those below the mean are in quartile 3 or 4. The dividing point for the entries above or below the mean is the midpoint of the range between the mean and the top or bottom entry. To illustrate:

The Alberta test had a mean, or average of \$1.989 for Income over Feed and Chick Cost. The highest income figure was \$2.420 and the lowest was \$0.770. To arrive at the dividing point between the 1st and 2d quartiles, subtract the mean (\$1.989) from the highest income (\$2.420). The result \$0.431 was divided by 2 to get the midpoint of the range (\$0.216). This was subtracted from the highest income (\$2.420 - 0.216) to arrive at the dividing point (\$2.204) between the 1st and 2d quartiles. A similar procedure was used to determine the 3d and 4th quartiles. These determinations for each trait and each test are tabulated on pages 52 through 55.

The breeders of the tested stocks are listed in alphabetical order and the performance of each entry of the stock is shown under the breeder's name. Each entry is also identified by the abbreviated name of the entrant. In some cases, the sample was drawn from a source other than the entrant's hatchery or supply flock. In such cases, the abbreviated name of the source is shown in parentheses following the entrant's name.

LIST OF ENTRANTS OTHER THAN BREEDER OF STOCK

<u>Name and Address</u>	<u>Stock Entered</u>
Arizona State Hatchery, Tucson, Arizona	Kimber
Atwood Hatchery, Comanche, Texas	H & N
Babcock Hatchery, Inc., Lititz, Pennsylvania	Babcock
Banks Hatchery, Chattanooga, Tennessee	Hy-Line
Barney's Hatchery, Franklin, New Jersey	Ghostley
Bloomingdale Poultry Farm, Valrico, Florida	Kimber
Boyarin Associates, Lakewood, New Jersey	Hy-Line
Check-R-Board, Palatka, Florida	DeKalb
Cochran Hatchery and Feed, Lewisburg, Tennessee	Honegger
Corrigan Gonzalez Export, Miami, Florida	Ghostley, Hy-Line
Cunningham Breeder Hatchery, Beaver Falls, Pennsylvania	Honegger
D & C Hatchery, Hamilton, Texas	Ideal
Del Rio Farm, Mesa, Arizona	Hansen (Wash.)
DeWitt's Texas Hatchery, Nacogdoches, Texas	Babcock
DeWitt's Turkey Hatchery, Inc., Waxahachie, Texas	Babcock
Dirkse Leghorn Farm, Zeeland, Michigan	Darby
Dover Farms, Toms River, New Jersey	Kimber
Erving's Hatcheries, McMinnville, Tennessee	H & N
Farvue Poultry Farm, South Salem, New York	Hy-Line

LIST OF ENTRANTS OTHER THAN BREEDER OF STOCK(Cont'd.)

<u>Name and Address</u>	<u>Stock Entered</u>
Feather Hill Farm, Dade City, Florida	Babcock
Flinn's Hatchery, San Antonio, Texas	Honegger
Florida State Hatcheries, Gainesville, Florida	Kimber
Frizzell Poultry Farm & Hatchery, Tampa, Florida	H & N
Godshall's Hatchery, Souderton, Pennsylvania	H & N
Golden Oak Hatchery, DeLeon, Texas	Ideal
Greider Leghorn Farms, Inc., Mt. Joy, Pennsylvania	Shaver
Grigsby's Hatchery, Georgetown, Texas	DeKalb
Hodges Poultry Farm & Hatchery, Callahan, Florida	Babcock
Hubbard Farms, Inc., Lancaster, Pennsylvania	Kimber
Hudson Hatchery, Jonesboro, Tennessee	Babcock
Hy-Lay Hatcheries, Inc., Bryan, Texas	Hy-Line
Joe's Hatchery, Arcadia, Florida	Babcock
Johnson Chick Co., Racine, Minnesota	Babcock
Kazmeier Hatchery, Bryan, Texas	Hy-Line
Kerr Chickeries, Frenchtown, New Jersey	Arbor Acres
Lamberton Hatchery, Lamberton, Minnesota	Ames
Longnecker's Hatchery, Elizabethtown, Pennsylvania	Kimber
Lowry Hatchery, Lowry, Minnesota	H & N
M & M Poultry Breeding Farm, Freehold, New Jersey	Ames
Maple Dale Hatchery, Austin, Minnesota	Arbor Acres
Maple Leaf Hatchery, Orange City, Florida	Rapp
Melini's Vineland Farms Hatchery, Vineland, New Jersey	Babcock
Miami International Hatchery, Inc., Miami, Florida	Kimber
Nichols Poultry Farm, Jefferson City, Tennessee	Kimber
Oak Crest Hatchery, DeFuniak Springs, Florida	Pillsbury
Oak Crest Hatcheries, Inc., Jacksonville, Florida	Arbor Acres, Pillsbury
Orange Blossom Hatchery, Jacksonville, Florida	Dryden
Parenti Hatchery, Minotola, New Jersey	Honegger
Peck Hatchery, Deer River, Minnesota	Honegger
Petrini and Sons, Richland, New Jersey	Warren
Pierce, A. D. Hatchery Inc., Brooklyn, Connecticut	Ames
Pierson-Craddock Hatchery, Hamilton, Texas	DeKalb
Pine Acres Poultry Farm, Lake City, Florida	H & N
Pine Air Poultry Acres, Jacksonville, Florida	Honegger
Rothway Hatcheries, Phoenix, Arizona	Hy-Line
Schubkegel Hatchery, Lakewood, New Jersey	DeKalb
Smith, Blanton, Nashville, Tennessee	Hy-Line
Strain Hatchery, Dalton, Georgia	H & N
Sun Valley Hatchery, Phoenix, Arizona	H & N
Sunnyside Hatchery, Portage, Wisconsin	Cashman
Swift & Co., LaCrosse, Wisconsin	Warren
Tri-State Hatchery, Inc., Graceville, Florida	DeKalb
Vance Hatchery, Shallowater, Texas	H & N
Von Minden's Hatchery, Fayetteville, Texas	Ames
Voscinar Poultry Farm, Brooksville, Florida	Ghostley
Wallace Hatchery, Inc., St. Petersburg, Florida	Hy-Line
Wallace Hy-Cross Hatcheries, Doylestown, Pennsylvania	Hy-Line
Weaver's Hatchery, Lititz, Pennsylvania	Cashman
Western Hatcheries, Dallas, Texas	Kimber
Wheelock, Walter E., Chambersburg, Pennsylvania	Ghostley
Williams Poultry Farm & Hatchery, Denison, Texas	H & N
Wilson Poultry Farm & Hatchery, Clyde, Texas	Hy-Line

SUMMARY OF IMPORTANT DATA FOR ALL RANDOM SAMPLE EGG LAYING TESTS

Trait Measured	Alberta		Arizona		British Columbia		California Floor	
Net Income Over Feed and Chick Costs Per Pullet Housed - Ave.	\$1. 989		\$3. 430		\$1. 679		\$3. 184	
Range - Quarter 1	\$2. 420	2. 204	\$3. 960	3. 695	\$2. 070	1. 874	\$3. 960	3. 572
" " 2	2. 203	1. 989	3. 694	3. 430	1. 873	1. 679	3. 571	3. 184
" " 3	1. 988	1. 379	3. 429	3. 170	1. 678	1. 079	3. 183	2. 577
" " 4	1. 378	0. 770	3. 169	3. 430	1. 078	0. 480	2. 576	1. 970
Egg Production Per Pullet Housed - Ave.	229. 45		226. 80		213. 87		274. 27	
Range - Quarter 1	251. 00	240. 22	247. 90	237. 35	241. 90	227. 88	305. 30	289. 78
" " 2	240. 21	229. 45	247. 34	226. 80	227. 87	213. 87	289. 77	274. 27
" " 3	229. 44	196. 82	226. 79	218. 80	213. 86	186. 33	274. 26	249. 83
" " 4	196. 81	164. 20	218. 79	210. 80	186. 32	158. 80	249. 82	225. 40
Days to 50% Production Average	169. 3		167. 0		177. 9		169. 3	
Range - Quarter 1	158. 0	163. 7	164. 0	165. 5	172. 0	174. 9	159. 0	164. 2
" " 2	163. 8	169. 3	165. 6	167. 0	175. 0	177. 9	164. 3	169. 3
" " 3	169. 4	172. 7	167. 1	169. 5	178. 0	181. 5	169. 4	176. 7
" " 4	172. 8	176. 0	169. 6	172. 0	181. 6	185. 0	176. 8	184. 0
% Mortality - Growing Period - Average	1. 26		4. 80		2. 14		1. 22	
Range - Quarter 1	0. 00	0. 63	1. 90	3. 35	0. 00	1. 07	0. 00	0. 61
" " 2	0. 64	1. 26	3. 36	4. 80	1. 08	2. 14	0. 62	1. 22
" " 3	1. 27	2. 48	4. 81	6. 50	2. 15	5. 52	1. 23	3. 11
" " 4	2. 49	3. 70	6. 51	8. 20	5. 53	8. 90	3. 12	5. 00
% Mortality - Laying House - Average	6. 61		8. 49		9. 91		8. 29	
Range - Quarter 1	2. 00	4. 31	5. 30	6. 90	3. 40	6. 66	1. 30	4. 80
" " 2	4. 32	6. 61	6. 91	8. 49	6. 67	9. 91	4. 81	8. 29
" " 3	6. 62	14. 31	8. 50	10. 90	9. 92	16. 66	8. 30	13. 05
" " 4	14. 32	22. 00	10. 91	13. 30	16. 67	23. 40	13. 06	17. 80
Egg Size - Average	24. 52		24. 39		25. 14		25. 08	
Range - Quarter 1	25. 60	25. 06	24. 90	24. 64	25. 80	25. 47	26. 30	25. 69
" " 2	25. 05	24. 52	24. 63	24. 39	25. 46	25. 14	25. 68	25. 08
" " 3	24. 51	24. 06	24. 38	23. 94	25. 13	24. 77	25. 07	24. 34
" " 4	24. 05	23. 60	23. 93	23. 50	24. 76	24. 40	24. 33	23. 60
Pounds Feed Per Dozen 24 oz. Eggs - Average	4. 673		4. 088		4. 493		4. 155	
Range - Quarter 1	4. 200	4. 437	3. 770	3. 929	4. 140	4. 317	3. 750	3. 953
" " 2	4. 438	4. 673	3. 930	4. 088	4. 318	4. 493	3. 954	4. 155
" " 3	4. 674	5. 312	4. 089	4. 269	4. 494	5. 307	4. 156	4. 528
" " 4	5. 313	5. 950	4. 270	4. 450	5. 308	6. 120	4. 529	4. 900
Albumen Score - Haugh Units - Average	74. 85		78. 63		75. 13		74. 15	
Range - Quarter 1	77. 50	76. 17	83. 00	80. 81	81. 30	78. 21	80. 40	77. 27
" " 2	76. 16	74. 85	80. 80	78. 63	78. 20	75. 13	77. 26	74. 15
" " 3	74. 84	73. 47	78. 62	75. 81	75. 12	72. 66	74. 14	71. 17
" " 4	73. 46	72. 10	75. 80	73. 00	72. 65	70. 20	71. 16	68. 20
Blood Spots - All Sizes Average	6. 34		1. 53		3. 71		5. 46	
Range - Quarter 1	1. 40	3. 87	0. 00	0. 77	1. 20	2. 46	1. 80	3. 63
" " 2	3. 88	6. 34	0. 78	1. 53	2. 47	3. 71	3. 64	5. 46
" " 3	6. 35	12. 92	1. 54	2. 12	3. 72	9. 36	5. 47	8. 38
" " 4	12. 93	19. 50	2. 13	2. 70	9. 37	15. 00	8. 39	11. 30

SUMMARY OF IMPORTANT DATA FOR ALL RANDOM SAMPLE EGG LAYING TESTS (Cont'd.)

California Cage		Central Canada		Florida		Iowa		Minnesota		Missouri	
.....		\$1.309		\$3.117		.....		\$1.721		\$3.279	
.....	.....	\$2.320	1.815	\$3.850	3.483	.....	.....	\$2.080	1.900	\$3.970	3.624
.....	.....	1.814	1.309	3.482	3.117	.....	.....	1.899	1.721	3.623	3.279
.....	.....	1.308	.560	3.116	2.628	.....	.....	1.720	1.485	3.278	2.834
.....	.....	.559	-.190	2.627	2.140	.....	.....	1.484	1.250	2.833	2.390
244.08		186.22		215.12		187.43		222.98		239.28	
276.40	260.24	228.00	207.11	237.80	226.46	212.90	200.16	242.90	232.94	263.50	251.39
260.23	244.08	207.10	186.22	226.45	215.12	200.15	187.43	232.93	222.98	251.38	239.28
244.07	214.54	186.21	153.76	215.11	196.61	187.42	177.36	222.97	212.54	239.27	219.79
214.53	185.00	153.75	121.30	196.60	178.10	177.35	167.30	212.53	202.10	219.78	200.30
167.5		180.0		172.3		177.9		191.6		173.4	
157.0	162.3	169.0	174.5	163.0	167.7	167.0	172.5	181.0	186.3	162.0	167.7
162.4	167.5	174.6	180.0	167.8	172.3	172.6	177.9	186.4	191.6	167.8	173.4
167.6	173.8	180.1	191.0	172.4	178.7	178.0	186.5	191.7	196.8	173.5	186.2
173.9	180.0	191.1	202.0	178.8	185.0	186.6	195.0	196.9	202.0	186.3	199.0
.....		5.05		5.45		9.50		13.71		5.65	
.....	.....	0.00	2.53	0.00	2.73	5.60	7.55	8.00	10.85	0.00	2.83
.....	.....	2.54	5.05	2.74	5.45	7.56	9.50	10.86	13.71	2.84	5.65
.....	.....	5.06	12.53	5.46	13.73	9.51	13.75	13.72	18.76	5.66	10.33
.....	.....	12.54	20.00	13.74	22.00	13.76	18.00	18.77	23.80	10.34	15.00
10.49		30.75		19.86		11.70		7.59		6.18	
0.00	5.25	12.60	21.68	6.30	13.08	5.70	8.70	1.40	4.50	0.00	3.09
5.26	10.49	21.69	30.75	13.09	19.86	8.71	11.70	4.51	7.59	3.10	6.18
10.50	24.60	30.76	46.48	19.87	25.83	11.71	15.85	7.60	10.65	6.19	12.09
24.61	38.70	46.49	62.20	25.84	31.80	15.86	20.00	10.66	13.70	12.10	18.00
25.13		24.95		24.66		24.58		25.60		24.20	
26.60	25.86	26.10	25.52	25.70	25.18	25.40	24.99	26.90	26.25	25.40	24.80
25.85	25.13	25.51	24.95	25.17	24.66	24.98	24.58	26.24	25.60	24.79	24.20
25.12	24.56	24.94	24.12	24.65	23.78	24.57	24.09	25.59	25.00	24.19	23.45
24.55	24.00	24.11	23.30	23.77	22.90	24.08	23.60	24.99	24.40	23.44	22.70
.....		4.441		4.183		.....		4.406		4.759	
.....	.....	3.800	4.121	3.800	3.992	.....	.....	4.020	4.213	4.350	4.555
.....	.....	4.122	4.441	3.993	4.183	.....	.....	4.214	4.406	4.556	4.759
.....	.....	4.442	5.026	4.184	4.442	.....	.....	4.407	4.608	4.760	5.090
.....	.....	5.027	5.610	4.443	4.700	.....	.....	4.609	4.810	5.091	5.420
75.51		67.44		81.04		83.60		81.04		86.16	
80.90	78.20	73.30	70.37	87.50	84.27	86.00	84.80	87.00	84.02	91.60	88.88
78.19	75.51	70.36	67.44	84.26	81.04	84.79	83.60	84.01	81.04	88.87	86.16
75.50	71.70	67.43	64.87	81.03	78.17	83.59	81.15	81.03	78.17	86.15	80.73
71.69	67.90	64.86	62.30	78.16	75.30	81.14	78.70	78.16	75.30	80.72	75.30
8.94		5.66		3.43		3.89		.....		4.34	
2.70	5.82	1.00	3.33	1.50	2.47	1.90	2.89	.....	.....	0.00	2.17
5.83	8.94	3.34	5.66	2.48	3.43	2.90	3.89	.....	.....	2.18	4.34
8.95	12.75	5.67	9.73	3.44	4.52	3.90	5.10	.....	.....	4.35	15.07
12.76	16.10	9.74	13.80	4.53	5.60	5.11	6.30	.....	.....	15.08	25.80

SUMMARY OF IMPORTANT DATA FOR ALL RANDOM SAMPLE EGG LAYING TESTS (Cont'd.)

Trait Measured	New Hampshire		New Jersey		Central New York		Western New York	
Net Income Over Feed and Chick Costs Per Pullet Housed - Ave.	\$2.045		\$4.256		\$2.317		\$2.290	
Range - Quarter 1	\$2.610	2.327	\$4.960	4.608	\$2.950	2.633	\$3.260	2.745
" " 2	2.326	2.045	4.607	4.256	2.632	2.317	2.744	2.290
" " 3	2.044	1.707	4.255	3.858	2.316	2.108	2.289	1.960
" " 4	1.706	1.370	3.857	3.460	2.107	1.900	1.959	1.630
Egg Production Per Pullet Housed - Ave.	191.68		226.09		213.28		217.75	
Range - Quarter 1	215.80	203.74	255.50	240.80	242.60	227.94	256.30	237.02
" " 2	203.73	191.68	240.79	226.09	227.93	213.28	237.01	217.75
" " 3	191.67	180.84	226.08	214.34	213.27	203.29	217.74	204.17
" " 4	180.83	170.00	214.33	202.60	203.28	193.30	204.16	190.60
Days to 50% Production Average	190.5		182.1		173.5		179.0	
Range - Quarter 1	181.0	185.8	168.0	175.1	165.0	169.3	165.0	172.0
" " 2	185.9	190.5	175.2	182.1	169.4	173.5	172.1	179.0
" " 3	190.6	194.8	182.2	189.1	173.6	177.3	179.1	187.5
" " 4	194.9	199.0	189.2	196.0	177.4	181.0	187.6	196.0
% Mortality - Growing Period - Average	5.74		....		2.86		2.45	
Range - Quarter 1	3.40	4.57	....	....	0.00	1.43	0.00	1.23
" " 2	4.58	5.74	....	....	1.44	2.86	1.24	2.45
" " 3	5.75	8.42	....	....	2.87	6.33	2.46	4.78
" " 4	8.43	11.10	....	....	6.34	9.80	4.79	7.10
% Mortality - Laying House - Average	16.86		8.16		8.64		7.04	
Range - Quarter 1	9.00	12.93	0.00	4.08	0.00	4.32	0.00	3.52
" " 2	12.94	16.86	4.09	8.16	4.33	8.64	3.53	7.04
" " 3	16.87	20.43	8.17	13.08	8.65	13.32	7.05	13.52
" " 4	20.44	24.00	13.09	18.00	13.33	18.00	13.53	20.00
Egg Size - Average	25.49		24.56		25.38		25.59	
Range - Quarter 1	26.40	25.94	26.20	25.30	26.50	25.94	26.60	26.09
" " 2	25.93	25.49	25.37	24.56	25.93	25.38	26.08	25.59
" " 3	25.48	24.79	24.55	24.03	25.37	25.09	25.58	24.84
" " 4	24.78	24.10	24.02	23.50	25.08	24.80	24.83	24.10
Pounds Feed Per Dozen 24 oz. Eggs - Average	5.023		4.428		4.561		4.753	
Range - Quarter 1	4.370	4.697	4.030	4.229	4.040	4.301	4.330	4.542
" " 2	4.698	5.023	4.230	4.428	4.302	4.561	4.543	4.753
" " 3	5.024	5.457	4.429	4.664	4.562	4.731	4.754	4.987
" " 4	5.458	5.890	4.665	4.900	4.732	4.900	4.988	5.220
Albumen Score - Haugh Units - Average	....		80.27		79.88		79.07	
Range - Quarter 1	....	....	83.40	81.83	83.60	81.74	86.50	82.78
" " 2	....	....	81.82	80.27	81.73	79.88	82.77	79.07
" " 3	....	....	80.26	78.38	79.87	76.24	79.06	74.98
" " 4	....	....	78.37	76.50	76.23	72.60	74.97	70.90
Blood Spots - All Sizes Average	....		3.09		5.12		4.30	
Range - Quarter 1	....	....	0.60	1.84	2.00	3.56	1.30	2.80
" " 2	....	....	1.85	3.09	3.57	5.12	2.81	4.30
" " 3	....	....	3.10	4.80	5.13	7.16	4.31	8.50
" " 4	....	....	4.81	6.50	7.17	9.20	8.51	12.70

SUMMARY OF IMPORTANT DATA FOR ALL RANDOM SAMPLE EGG LAYING TESTS (Cont'd.)

North Carolina		Rhode Island		Pennsylvania		Tennessee		Texas		Wisconsin	
\$1.735		\$4.046		\$3.440		\$2.858		\$3.150		\$2.485	
\$2.930	2.332	\$5.250	4.648	\$4.360	3.900	\$4.060	3.459	\$3.840	3.495	\$3.240	2.862
2.331	1.735	4.647	4.046	3.899	3.440	3.458	2.858	3.494	3.150	2.861	2.485
1.734	1.112	4.045	3.218	3.439	2.565	2.857	2.424	3.149	2.710	2.484	2.008
1.111	0.490	3.217	2.390	2.564	1.690	2.423	1.990	2.709	2.270	2.007	1.530
228.36		228.29		229.88		194.60		213.96		238.17	
271.60	249.98	267.40	247.84	263.40	246.64	233.10	213.85	241.60	227.78	273.90	256.03
249.97	228.36	247.83	228.29	246.63	229.88	213.84	194.60	227.77	213.96	256.02	238.17
228.35	213.13	228.28	205.29	229.87	207.44	194.59	175.60	213.95	196.68	238.16	222.73
213.12	197.80	205.28	182.30	207.43	185.00	175.59	156.60	196.67	179.40	222.72	207.30
173.7		171.1		176.1		166.3		174.3		171.7	
166.0	169.9	157.0	164.1	159.0	167.6	154.0	160.2	167.0	170.7	163.0	167.4
170.0	173.7	164.2	171.1	167.7	176.1	160.3	166.3	170.8	174.3	167.5	171.7
173.8	176.4	171.2	175.1	176.2	181.6	166.4	171.7	174.4	179.7	171.8	175.4
176.5	179.0	175.2	179.0	181.7	187.0	171.8	177.0	179.8	185.0	175.5	179.0
2.57		1.71		21.74		4.13		2.87		3.95	
0.00	1.29	0.00	0.86	6.40	14.07	0.00	2.07	0.00	1.44	0.00	1.98
1.30	2.57	0.87	1.71	14.08	21.74	2.08	4.13	1.45	2.87	1.99	3.95
2.58	6.59	1.72	3.71	21.75	31.82	4.14	7.72	2.88	7.54	3.96	6.98
6.60	10.60	3.72	5.70	31.83	41.90	7.73	11.30	7.55	12.20	6.99	10.00
10.73		12.92		10.78		15.56		9.68		12.58	
1.00	5.87	3.90	8.41	0.00	5.39	3.40	9.48	0.00	4.84	2.00	7.29
5.88	10.73	8.42	12.92	5.40	10.78	9.49	15.56	4.85	9.68	7.30	12.58
10.74	16.37	12.93	22.81	10.79	21.69	15.57	21.93	9.69	16.29	12.59	18.29
16.38	22.00	22.82	32.70	21.70	32.60	21.94	28.30	16.30	22.90	18.30	24.00
25.67		25.10		25.32		24.70		25.21		25.06	
27.00	26.33	26.60	25.85	27.20	26.26	25.60	25.15	26.20	25.70	25.90	25.48
26.32	25.67	25.84	25.10	26.25	25.32	25.14	24.70	25.69	25.21	25.47	25.06
25.66	25.08	25.09	24.50	25.31	24.71	24.69	24.25	25.20	24.55	25.05	24.48
25.07	24.50	24.49	23.90	24.70	24.10	24.24	23.80	24.54	23.90	24.47	23.90
4.179		4.749		4.404		5.159		4.120		4.117	
3.620	3.900	4.120	4.435	3.960	4.182	4.540	4.850	3.750	3.935	3.690	3.904
3.901	4.179	4.436	4.749	4.183	4.404	4.851	5.159	3.936	4.120	3.905	4.117
4.180	4.490	4.750	5.400	4.405	5.337	5.160	5.395	4.121	4.310	4.118	4.309
4.491	4.800	5.401	6.050	5.338	6.270	5.396	5.630	4.311	4.500	4.310	4.500
78.84		76.80		80.88		71.76		78.70		88.44	
81.90	80.37	82.40	79.60	86.70	83.79	76.10	73.93	82.50	80.60	91.90	90.17
80.36	78.84	79.59	76.80	83.78	80.88	73.92	71.76	80.59	78.70	90.16	88.44
78.83	77.02	76.79	73.70	80.87	76.54	71.75	68.13	78.69	75.55	88.43	85.02
77.01	75.20	73.69	70.60	76.53	72.20	68.12	64.50	75.54	72.40	85.01	81.60
5.00		4.20		3.63		5.05		3.77		5.47	
2.00	3.50	2.20	3.20	1.30	2.47	1.20	3.13	1.00	2.39	2.80	4.14
3.51	5.00	3.21	4.20	2.48	3.63	3.14	5.05	2.40	3.77	4.15	5.47
5.01	7.45	4.21	5.25	3.64	5.87	5.06	8.63	3.78	7.59	5.48	7.89
7.46	9.90	5.26	6.30	5.88	8.10	8.64	12.20	7.60	11.40	7.90	10.30

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEED COST (\$)	EGG PRO- DUCTION (Hens housed)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN (LBS)	ALBUMEN QUALITY (H.U.)	SPOTS PER EGG (%)
Allstate Hatchery, Willmar, Minnesota												
Allstate, Minn.	Minn.	WL	LX 330	4	4	2	3	4	3	4	3	
Allstate, Minn.	WNY	WL	LX 330	3	3	2	3	2	3	3	2	1
Allstate, Minn.	Tenn.	WL	LX 330	3	3	2	2	4	4	2	3	1
Allstate, Minn.	Wisc.	WL	LX 330	3	3	3	3	3	1	2	3	2
Ames In-Cross, Des Moines, Iowa												
Ames, Iowa	Mo.	INX	W-40 Royal	1	1	3	1	1	1	1	3	1
Ames In-Cross, Des Moines, Iowa												
Von Minden, Texas (Ames, Iowa).....	Texas	INX	424	3	3	3	1	2	2	4	2	2
Ames In-Cross, Des Moines, Iowa												
Ames, Iowa (Rump & Sendall, B. C.)....	B. C.	INX	434 R	3	2	2	3	3	3	3	3	1
Ames, Iowa	Cal. F	INX	434 R	3	2	1	1	2	3	3	4	1
Ames, Iowa	Cal. C	INX	434 R		3	2	3	4	4	2	4	2
Ames, Iowa	Iowa	INX	434 R		2	1	1	3	3	3	3	1
Lamberton, Minn.	Minn.	INX	434 R	4	3	3	4	4	2	3	4	
Ames, Iowa (M & M, N. J.)	N. J.	INX	434 R	4	3	2	4	4	3	4	4	3
Ames, Iowa	Penna.	INX	434 R	3	3	1	2	2	4	2	4	1
Ames, Iowa	Tenn.	INX	434 R	1	1	1	3	1	4	2	4	1
Ames, Iowa	Texas	INX	434 R	4	3	2	3	4	4	4	4	1
Ames, Iowa	Wisc.	INX	434 R	4	4	4	2	4	2	4	4	4
Ames In-Cross, Des Moines, Iowa												
Ames, Iowa (Schaper, Iowa)												
Ames, Iowa (Childers, Cal.)	Cal. F	INX	505	3	4	4	1	2	1	4	3	1
Ames, Iowa (Childers, Cal.)	Cal. C	INX	505		4	4	3	3	2	2	3	3
Ames, Iowa	N. H.	INX	505	3	4	3	3	1	2	3		
Ames, Iowa (Suffolk, Va.)	N. C.	INX	505	4	4	4	1	2	2	4	3	1
Pierce, Conn.	R. I.	INX	505	2	3	4	4	2	2	2	3	2
Ames In-Cross, Des Moines, Iowa												
Ames, Iowa	Mo.	INX	525	3	3	4	2	2	1	2	4	3
Andrews, J. J., Chilliwick, B. C.												
Andrews, B. C.	B. C.	WL	813	2	2	2	3	3	3	1	3	1
Andrews, B. C.	Cent. Can, WL	SX	813	2	2	2	2	3	3	2	2	1
Anthony, Geo. M. & Sons, Strausstown, Pennsylvania												
Anthony, Penna.	Mo.	WL	Anthony	2	2	2	2	4	3	2	2	1
Anthony, Penna.	N. J.	WL	Anthony	4	4	3	3	1	4	2	2	2
Anthony, Penna.	CNY	WL	Anthony	4	3	2	3	3	3	3	2	1
Anthony, Penna.	Penna.	WL	Anthony	3	3	3	2	2	3	3	2	3
Anthony, Penna.	R. I.	WL	Anthony	2	2	3	1	2	3	2	1	1

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (CONT'D.)

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEE CHICK (\$)	EGG PRO- DUCTION (NO.)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN PER 24-HR. (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Appleby Poultry Farm, Mission City, B. C.	B. C.	WL	SX	Life Line	1	2	3	1	2	1	2	1
Appleby, B. C.	C. Can.	WL	SX	Life Line	2	2	3	2	3	2	1	1
Appleby, B. C.	B. C.	WL	SX	Queen	1	2	3	2	3	1	2	2
Arbor Acres Farm, Inc., Glastonbury, Conn.	Cal. F	WL	SX	Queen	2	2	3	1	2	1	1	3
Arbor Acres, Conn. (Redline, B. C.)	Cal. C	WL	SX	Queen	2	4	2	2	2	1	1	3
Arbor Acres, Conn. (White, Cal.)	Fla.	WL	SX	Queen	4	4	4	3	4	4	2	4
Arbor Acres, Conn. (White, Cal.)	Iowa	WL	SX	Queen	3	3	4	3	2	1	3	3
Oak Crest, Fla.	Minn.	WL	SX	Queen	2	3	2	4	3	2	2	2
Arbor Acres, Conn. (Denger, Iowa)	Mo.	WL	SX	Queen	2	2	2	1	2	1	2	2
Maple Dale, Minn.	N. H.	WL	SX	Queen	2	2	2	4	3	1	2	4
Arbor Acres, Conn.	N. J.	WL	SX	Queen	2	2	2	2	2	1	2	4
Arbor Acres, Conn.	(Kerr, N. J.)	WL	SX	Queen	4	4	4	2	4	2	2	2
Arbor Acres, Conn.	(Hawley, N. Y.)	WL	SX	Queen	3	2	3	4	3	2	2	3
Arbor Acres, Conn.	WNY	WL	SX	Queen	2	2	4	2	1	2	1	3
Arbor Acres, Conn. (Jaffe, N. Y.)	N. C.	WL	SX	Queen	2	2	3	2	4	1	2	2
Arbor Acres, Conn. (Davis, N. C.)	Penna.	WL	SX	Queen	3	3	4	3	3	3	1	2
Arbor Acres, Conn.	Texas	WL	SX	Queen	2	2	3	3	4	2	2	3
Arbor Acres, Conn. (Miller, Texas)	Wisc.	WL	SX	Queen	2	2	3	3	4	2	1	3
Arbor Acres, Conn. (Lemmen, Mich.)	Penna.	WL	SX	Queen B	2	2	4	3	2	1	2	4
Arbor Acres Farm, Inc., Glastonbury, Conn.	B. C.	WL	SX	Queen B	2	2	4	3	2	1	2	4
Arbor Acres, Conn.	C. Can.	WRx(RIRxLS)	Cream Egg Layer	3	3	3	3	3	4	3	4	3
Arnold, C. T., Arborg, Manitoba	C. Can.	WRx(RIRxLS)	Cream Egg Layer	4	3	2	4	4	3	3	3	3
Arnold, Manitoba	N. H.	WRxRIR	Avery	4	2	3	4	4	4	3		
Avery, C. T. & Son, Colrain, Massachusetts	R. I.	RIR	PS	Candidate	2	2	2	1	2	4	4	4
Avery, Mass.	Cal. F	WL	SX	Bessie	3	3	3	3	3	3	2	3
Babcock Poultry Farm, Ithaca, New York	Cal. C	WL	SX	Bessie	1	1	1	3	2	2	2	3
Babcock, N. Y. (Hogsett, Cal.)	Fla.	WL	SX	Bessie	1	1	1	2	1	3	1	2
Babcock, N. Y. (Hogsett, Cal.)	Iowa	WL	SX	Bessie	2	1	2	2	3	3	3	1
Feather Hill, Fla.	Minn.	WL	SX	Bessie	3	3	4	3	4	2	3	3
Hodges, Fla.	Mo.	WL	SX	Bessie	2	2	2	2	3	2	3	2
Babcock, N. Y. (Gretewold, Iowa)	N. J.	WL	SX	Bessie	3	2	2	2	3	3	2	1
Johnson, Minn.	CNY	WL	SX	Bessie	4	4	2	2	2	3	1	3
Babcock, N. Y.	N. C.	WL	SX	Bessie	3	3	3	3	3	3	2	4
Babcock, N. Y. (Melini, N. J.)	Penna.	WL	SX	Bessie	3	2	2	2	3	3	3	3
Babcock, N. Y.	R. I.	WL	SX	Bessie	3	2	2	1	3	2	2	4
Babcock, N. Y. (Harolds, Ga.)	Tenn.	WL	SX	Bessie	2	2	2	1	1	3	2	2
Babcock, Penna.	Texas	WL	SX	Bessie	2	2	1	1	1	3	2	2
Babcock, N. Y.	Wisc.	WL	SX	Bessie	2	3	3	3	2	2	2	2
Hudson, Tenn.												
DeWitt, Texas (Babcock, N. Y.)												
Babcock, N. Y. (Rasmussen, Wisc.)												

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	(S) INCOME OVER FEE AD CHICK	(NO.) EGG PRO- DUCTION (Hens housed)	(DAYS) AGE AT 50% PRO- DUCTION	(%) GROWING MORTALITY	(%) LAYING MORTALITY	(OZ) EGG WEIGHT	(SPT) FEE PER DOZEN 24-OZ EGGS	(H.U.) ALBUMEN QUALITY	(%) BLOOD SPOTS
Babcock Poultry Farm, Ithaca, New York												
Babcock, N. Y.	Cal. F	WL	SX	Bonnie	2	1	1	1	3	3	3	2
Babcock, N. Y.	Cal. C	WL	SX	Bonnie	1	1	1	3	3	3	2	1
Joe's, Fla.	Fla.	WL	SX	Bonnie	2	1	2	2	3	3	3	2
Babcock, N. Y.	Mo.	WL	SX	Bonnie	2	1	1	3	3	3	3	1
Babcock, N. Y.	WNY	WL	SX	Bonnie	2	1	2	1	4	2	2	3
Babcock, N. Y.	Penna.	WL	SX	Bonnie	1	1	2	2	3	1	3	2
Babcock, N. Y.	Tenn.	WL	SX	Bonnie	1	1	2	2	4	1	3	1
DeWitt, Texas (Babcock, N. Y.)	Texas	WL	SX	Bonnie	3	2	3	3	4	2	3	3
Bagby Poultry Farm, Sedalia, Missouri												
Bagby, Mo.	Mo.	WL	PS	One Grade	1	1	1	2	2	2	2	1
Balakshin, N. A., Chilliwick, B. C.	B. C.	WL	SX	Balakshin	1	1	2	3	3	1	2	1
Balakshin, B. C.	C. Can.	WL	SX	Balakshin	2	1	2	2	4	2	2	2
Ball Poultry Farm, Owego, New York												
Ball, N. Y.	CNY	WL	SX	591	3	2	2	4	3	4	3	3
Ball, N. Y.	WNY	WL	SX	591	2	2	1	1	3	2	2	1
Ball Poultry Farm, Owego, New York	Penna.	WL	SX	592	3	3	2	3	4	3	3	4
Ballew, Ken, Hatchery, Mansfield, Missouri	Mo.		BX	Bee Line 99	3	3	2	3	3	2	3	1
Ballew, Mo.	Mo.	WL	SX	408	3	3	1	3	2	3	2	3
Baumgartner Poultry Farm, Litchfield, Minn.	Mo.	WL	SX	Beamsdale 66	3	3	3	1	4	3	2	1
Beamsdale Farm, Lavndale, North Carolina	N. C.	WL	SX	Beamsdale 66	2	2	3	1	3	2	2	2
Beamsdale, N. C.	Mo.		INX	Booth Line 351	3	3	3	4	3	2	3	1
Beamsdale, N. C.	Wisc.		INX	Booth Line 351	2	2	2	1	2	3	2	2
Booth Farms & Hatchery, Clinton, Missouri	Mo.	WL	PS	Super Star	3	3	2	3	3	3	2	3
Booth, Mo.	Mo.	WL	SX	Money Maker #1	3	3	2	3	2	3	2	1
Booth, Mo.	N. J.	WL	SX	Money Maker #1	3	4	3	3	1	3	3	3
Breder's Leghorns, Ferndale, New York	CNY	WL	SX	Money Maker #1	4	4	3	2	3	2	4	2
Breder, N. Y.	WNY	WL	SX	Money Maker #1	4	4	2	3	3	2	3	4
Breder, N. Y.	N. C.	WL	SX	Money Maker #1	3	4	4	1	3	2	3	3
Breder, N. Y.	Penna.	WL	SX	Money Maker #1	2	3	3	3	1	1	3	1
Breder, N. Y.	Tenn.	WL	SX	Money Maker #1	3	3	3	4	1	1	3	3
Breder, N. Y.	Texas	WL	SX	Money Maker #1	3	3	3	3	2	1	4	3

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME AND CHICK COST (\$)	EGG PRO- DUCTION (NO.)	AGE AT 50% PRO- DUCTION (OAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN 24-OZ (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Buchanan's Poultry Farm, Haney, B. C.	B. C.	WLx(WLxBA)	Kanaka White	3	3	1	4	4	1	3	3	2
Buchanan, B. C.	.....										
Buchanan, B. C.	.....										
Bundesen Bros., Petaluma, California	C. Can.	WLx(WLxBA)	Kanaka White	2	2	1	2	2	2	1	4	2
Bundesen, Cal.	.....										
Bundesen, Cal.	.....										
Cameron Hatchery, Beaver Springs, Penna.	Cal. C	CGxWL BX	Graycie		3	3		3	2		3	3
Cameron, Penna.	Cal. F	CGxWL BX	Graycie	3	3	3	1	3	2	3	3	2
Carey Farms, Marion, Ohio	Penna.	WL	DMX	1	2	2	2	2	3	1	2	1
Carey, Ohio	.....										
Carey, Ohio	.....										
Cashman Leghorn Farm, Webster, Kentucky	Mo.	WL	Carey Nicks	3	3	2	3	4	3	3	2	1
Cashman, Ky. (Abbotsford, B. C.)	WNY	WL	Carey Nicks	4	4	2	3	3	2	3	2	1
Cashman, Ky.	Penna.	WL	Carey Nicks	2	3	2	4	2	3	2	1	1
Cashman, Ky. (Bowers, N. C.)	B. C.	WL	Hi-Cash	1	1	3	2	2	4	1	3	3
Weaver, Penna.	Mo.	WL	Hi-Cash	2	1	2	2	1	3	3	3	2
Cashman, Ky.	N. C.	WL	Hi-Cash	2	2	3	2	2	2	2	2	4
Cashman, Ky.	Penna.	WL	Hi-Cash	1	1	3	2	1	3	1	3	2
Cashman, Ky.	Tenn.	WL	Hi-Cash	4	3	2	3	4	4	2	3	3
Cashman, Ky.	Texas	WL	Hi-Cash	2	1	3	1	4	4	2	3	1
Sunnyside, Wisc.	Wisc.	WL	Hi-Cash	3	3	3	3	4	3	2	2	3
Childers Hatchery, Santa Ana, California	Cal. F	CGxWL BX	Childers	2	2	1	1	3	3	2	3	2
Childers, Cal.	Cal. C	CGxWL BX	Childers		1	1		1	2		2	2
Clark, H. R., Burt's Corner, New Brunswick	C. Can.	RIRxCR BX	Clark's 41	3	3	3	1	2	2	4	3	4
Clark, N. B.	.....										
Clark's Poultry Farm, Brandon, Manitoba	Alta.	RIRx(LSxRIR)	Paymaster 101	1	2	1	1	2	1	2	4	4
Clark, Manitoba	C. Can.	RIRx(LSxRIR)	Paymaster 101	2	2	3	2	1	1	3	3	4
Colonial Poultry Farms, Pleasant Hill, Mo.	Mo.	WL	Best Egg Grade	3	3	2	3	3	2	3	2	1
Colonial, Mo.	.....										
Colonial Poultry Farms, Pleasant Hill, Mo.	Cal. F	WL	True Line 365	3	3	2	3	3	2	3	1	4
Colonial, Mo.	Cal. C	WL	True Line 365		3	2		3	2		2	4
Colonial, Mo. (Thorpe, Iowa)	Iowa	WL	True Line 365		4	3	4	3	3		2	4
Colonial, Minn.	Minn.	WL	True Line 365	3	3	3	3	2	3	3	1	
Colonial, Mo.	Mo.	WL	True Line 365	2	1	2	3	1	3	2	3	3
Colonial, Mo. (Kreher, N. Y.)	CNY	WL	True Line 365	3	3	2	4	4	1	2	3	3
Colonial, Mo. (Foeards, N. C.)	N. C.	WL	True Line 365	3	3	2	3	3	3	2	2	4
Colonial, Mo.	Penna.	WL	True Line 365	3	2	3	2	3	3	2	3	2
Colonial, Mo.	Tenn.	WL	True Line 365	4	3	2	2	3	2	4	1	3
Colonial, Mo.	Texas	WL	True Line 365	4	4	4	2	4	4	4	1	3

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEED AND CHICK COST (\$)	EGG PRO- DUCTION (No.)	AGE AT 50% PRO- DUCTION (Days)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN 24-OZ (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Co-op Hatcheries, Edmonton, Alberta	Alta.	CRxRIR BX	Paramount Col. X	4	4	1	1	4	3	4	3	4
Co-op, Alta.												
Cornell University, Ithaca, New York												
Cornell, N. Y.	Cal. F	WL	PS Random Bred	3	2	3	3	1	3	3	2	3
Cornell, N. Y.	Cal. C	WL	PS Random Bred		3	4		3	4		2	3
Cornell, N. Y.	Fla.	WL	PS Random Bred	3	2	3	2	1	3	3	3	3
Cornell, N. Y.	Minn.	WL	PS Random Bred	3	3	3	4	2	3	3	4	
Cornell, N. Y.	Mo.	WL	PS Random Bred	4	3	3	2	4	4	4	2	1
Cornell, N. Y.	CNY	WL	PS Random Bred	3	2	1	2	1	3	3	2	2
Cornell, N. Y.	WNY	WL	PS Random Bred	3	2	2	1	2	4	2	2	3
Cornell, N. Y.	N. C.	WL	PS Random Bred	3	3	4	2	3	4	3	3	3
Cornell, N. Y.	Penna.	WL	PS Random Bred	2	2	2	3	3	3	2	3	3
Cornell, N. Y.	Tenn.	WL	PS Random Bred	3	3	3	2	2	3	4	2	3
Cornell, N. Y.	Texas	WL	PS Random Bred	3	3	3	1	2	4	4	3	2
Cornell, N. Y.	Wisc.	WL	PS Random Bred	4	3	3	3	2	4	3	3	2
Couvoir Co-Operatif, Ste. Martine, Quebec	C. Can.	WL	SX 98	2	1	2	1	2	3	1	3	3
Couvoir, Quebec												
Couvoir Co-Operatif, St. Augustin, Quebec	C. Can.	WL	SX Corvette	1	1	2	1	1	1	1	1	1
Dawson, Ivan B., Central Bedeque, P.E.I.												
Dawson, P.E.I.	C. Can.	WLx(WLxBR)	Series 1000	3	3	3	3	3	3	3	3	1
DeKalb Agricultural Assoc., Sycamore, Ill.												
DeKalb, Ill. (McCallum, Ont.)	C. Can.	INX 101		2	2	1	2	1	2	2	2	2
Check-R-Board, Fla.	Fla.	INX 101		3	4	2	3	4	1	2	2	3
DeKalb, Ill.	Minn.	INX 101		3	3	1	2	2	2	1	3	
DeKalb, Ill.	Mo.	INX 101		2	3	2	1	3	1	1	3	1
Pierson, Texas (DeKalb, Texas)	Texas	INX 101		3	3	2	1	1	1	2	2	1
DeKalb, Ill. (Loehr, Wisc.)	Wisc.	INX 101		3	2	1	1	2	3	2	3	1
DeKalb Agricultural Assoc., Sycamore, Ill.												
DeKalb, Ill. (Donsing, Cal.)	Cal. F	INX 131		2	2	1	1	2	2	1	3	2
DeKalb, Ill. (Donsing, Cal.)	Cal. C	INX 131		2	1	3		2	2		2	3
Tri-States, Fla.	Fla.	INX 131		2	2	2	1	3	3	1	3	1
DeKalb, Ill. (Madrid, Iowa)	Iowa	INX 131		2	2	3	2	1	3		2	1
DeKalb, Ill.	Mo.	INX 131		2	2	1	1	2	2	1	1	2
DeKalb, Ill. (Schubkegel, N.J.)	N. J.	INX 131		2	2	1	1	2	1	1	3	1
DeKalb, Ill. (Glor, N.Y.)	CNY	INX 131		1	1	1	2	1	4	1	3	1
DeKalb, Ill. (Raleigh, N.C.)	N. C.	INX 131		1	1	1	1	1	4	1	2	1
DeKalb, Ill.	Penna.	INX 131		2	2	2	3	3	3	1	3	3
DeKalb, Ill.	Tenn.	INX 131		4	3	2	2	3	3	3	1	3
DeKalb, Ill.	Texas	INX 131		4	3	1	3	3	3	3	3	3
Grigsby, Texas	Texas	INX 131		3	2	2	1	1	2	2	1	2
DeKalb, Ill. (Stark, Wisc.)	Wisc.	INX 131		1	1	3	1	1	1	1	2	1

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION				TEST	BREED	STOCK	INCOME OVER FEED AND CHICK COST (\$)	EGG PRO- DUCTION (NO.) (hen housed)	AGE AT Laying (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN 24-OZ. EGGS (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)	
Del Rio Farm, Mesa, Arizona				Ariz.	RIR	PS	Del Rio	4	3	2	2	3	3	4	3	4
Del Rio, Ariz.																
Demler Farms, Anaheim, California				Cal. F	WL	SX	One Grade	3	3	3	4	2	3	2	1	3
Demler, Cal.				Cal. C	WL	SX	One Grade	4	3	3	3	4	2	2	3	3
Demler, Cal.																
Demler Farms, Anaheim, California				Cal. F	Syn. x WL		Demler Kross	3	3	2	3	3	2	3	3	3
Demler, Cal.				Cal. C	Syn. x WL		Demler Kross	3	2	3	3	3	3	3	3	3
Demler, Cal.																
Demler Farms, Anaheim, California				B. C.	INX		Demler IBX	1	1	1	1	1	4	1	3	2
Demler, Cal. (Suderman, B. C.)				Cal. F	INX		Demler IBX	1	3	3	1	4	4	1	3	3
Demler, Cal.				Cal. C	INX		Demler IBX	3	3	3	3	2	3	3	3	3
Demler, Cal.				R. I.	INX		Demler IBX	3	3	2	2	3	3	3	2	2
Demler, Cal.				Texas	INX		Demler IBX	2	2	3	1	2	3	3	3	3
Demler, Cal.																
Deverill, Mrs. A. C., Eriksdale, Manitoba				C. Can.	NHxLS	BX	Keyline 403	3	3	2	4	3	1	3	2	4
Deverill, Manitoba																
deZeeuw Leghorn Breeder, So. Edmonton, Alta.				Alta.	WL	SX	601	2	2	2	4	3	3	1	1	1
deZeeuw, Alta.				B. C.	WL	SX	601	3	2	2	2	3	2	3	2	2
deZeeuw, Alta.				C. Can.	WL	SX	601	2	1	1	1	2	3	2	3	3
deZeeuw, Alta.																
deZeeuw Leghorn Breeder, So. Edmonton, Alta.				Alta.	WL	SX	752	1	2	3	4	1	2	1	4	1
deZeeuw, Alta.																
Drake, John W., Skillman, New Jersey				N. J.	WL	PS	One Grade	4	3	2	2	4	4	3	1	1
Drake, N. J.																
Dryden Farms, Inc., Modesto, California				Fla.	CGxWL	BX	Gray X Leghorn	3	3	3	3	4	3	3	4	4
Orange Blossom, Fla.																
Dryden Farms, Inc., Modesto, California				Cal. F	WL	SX	SX 60	3	3	4	3	3	2	2	2	3
Dryden, Cal.				Cal. C	WL	SX	SX 60	3	3	3	3	2	2	2	2	2
Dryden, Cal.				Fla.	WL	SX	SX 60	3	3	4	1	4	1	2	3	2
Orange Blossom, Fla.																
Dryden Farms, Inc., Modesto, California				Cal. F	WL	SX	SX 72	1	3	3	3	4	3	3	3	4
Dryden, Cal.				Cal. C	WL	SX	SX 72	3	3	3	3	4	3	2	4	4
Dryden, Cal.																
Early Hatcheries, Saskatoon, Saskatchewan				C. Can.	WLx(RIRxLS)		Hi Layers	2	2	1	3	3	3	2	3	2
Early, Sask.																
Early Hatcheries, Saskatoon, Saskatchewan				Alta.	LSxRIR	BX	Silver & Gold	1	1	1	1	1	3	1	3	2
Early, Sask.				B. C.	LSxRIR	BX	Silver & Gold	4	4	4	2	4	2	4	2	4
Early, Sask.																
Eby's Poultry Farm, Carrollton, Texas				Mo.	WL	SX	Grade #1	1	1	1	2	1	4	2	2	3
Eby, Texas				Texas	WL	SX	Grade #1	3	3	2	3	2	4	2	2	4
Eby, Texas																

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEE AND CHICK COST (\$)	ON- EGG PRO- DUCTION (Hens housed)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ.)	FEED PER DOZEN 24-OZ. EGGS (LBS.)	ALBUMEN QUALITY (H.U.)	SPLOOTS (%)
Eelman Poultry Farm, Wayne, New Jersey	N. J.	WL	SX FF 166	2	2	3	2	2	3	2	3	2
Eelman, N. J.												
Erath Egg Farm, Stephenville, Texas	Texas	WL	SX Erath Str. X	1	2	4	3	1	1	2	2	3
Erath, Texas												
Evans, F. C., Abbottsford, B. C.	Alta.	WL	SX Echo Line	3	3	4	3	3	2	3	3	2
Evans, B. C.	B. C.	WL	SX Echo Line	1	2	4	1	2	2	1	3	2
Evans, B. C.	C. Can.	WL	SX Echo Line	1	1	3	1	1	2	2	2	2
Fisher Poultry Farm, Ayton, Ontario	C. Can.	WL	SX 103	1	2	3	1	1	2	2	2	2
Fisher, Ont.												
Fletcher Hatchery, Concord, North Carolina	N. C.	WL	SX FX 100	2	3	3	3	3	2	2	2	3
Fletcher, N. C.												
Ford's Leghorn Farm, Lockport, New York	WNY	WL	SX Ford V88	3	3	3	2	3	2	2	3	4
Ford, N. Y.	Penna.	WL	SX Ford V88	3	3	4	3	3	4	3	3	4
Ford, N. Y.												
Forsgate Farms, Jamesburg, New Jersey	N. J.	WL	SX FF 160	2	2	4	2	2	2	1	1	3
Forsgate, N. J.												
Forsgate Farms, Jamesburg, New Jersey	CNY	WL	PS Forsgate	3	3	4	3	2	2	3	1	4
Forsgate, N. J.	Penna	WL	PS Forsgate	3	4	3	3	2	3	3	2	1
Forsgate, N. J.												
Garber Poultry Breeding Farm, Modesto, California	Cal. F	CGxWL BX	Garber	1	1	1	1	1	2	1	2	1
Garber, Cal.	Cal. C	CGxWL BX	Garber	1	1	1	3	2	2	2	2	1
Garber, Cal.												
Garber Poultry Breeding Farm, Modesto, California	Cal. F	WL	SX G 200	1	1	2	1	1	3	1	1	2
Garber, Cal.	Cal. C	WL	SX G 200	2	2	2	3	2	2	1	2	2
Garber, Cal.												
Garber Poultry Breeding Farm, Modesto, California	Cal. F	WL	SX G 300	1	2	3	3	2	2	1	1	3
Garber, Cal.	Cal. C	WL	SX G 300	3	2	2	2	2	2	2	2	1
Garber, Cal.	Penna.	WL	SX G 300	1	2	3	2	2	3	1	2	1
Garber, Cal.												
Garrison, Earl W., Bridgeton, New Jersey	Penna.	RIRxWR	Golden Sex Link	3	4	2	4	4	1	4	3	1
Garrison, N. J.												
Garrison, Earl W., Bridgeton, New Jersey	N. J.	WL	SX Garrison X300	1	1	1	1	1	4	1	3	3
Garrison, N. J. (Stever, Penna.)												
Garrison's Poultry Farm, Versailles, Ohio	Mo.	WL	SX G 33	3	3	3	2	2	2	4	1	2
Gasson, Ohio	Tenn.	WL	SX G 33	3	4	3	2	4	4	2	2	2
Gasson, Ohio	Wisc.	WL	SX G 33	3	3	2	1	2	4	3	1	2
Gasson, Ohio												

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEED AND CHICK COST (\$)	EGG PRO- DUCTION (Hen housed)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (ZO)	FEED PER DOZEN 24-OZ. EGGS (SBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Ghostley's Poultry Farm, Anoka, Minnesota												
Ghostley, Minn. (Santa Clara, Cal.).....	Cal. F	WL	Pearl	2	3	3	3	3	3	2	2	3
Ghostley, Minn. (Santa Clara, Cal.).....	Cal. C	WL	Pearl		2	2		2	2	2	2	2
Corrigan, Fla.	Fla.	WL	Pearl	3	3	3	3	4	1	2	1	2
Voscinar, Fla.	Fla.	WL	Pearl	3	3	3	3	4	3	3	2	4
Ghostley, Minn. (Grundmeier, Iowa).....	Iowa	WL	Pearl	3	4	3	1	3	2	2	2	3
Ghostley, Minn.	Minn.	WL	Pearl	3	3	3	2	4	1	2	1	
Ghostley, Minn.	Mo.	WL	Pearl	3	3	2	2	4	1	3	1	2
Ghostley, Minn.	N. H.	WL	Pearl	2	2	1	1	4	1	1		
Ghostley, Minn. (Barney, N. J.).....	N. J.	WL	Pearl	2	2	2		3	2	3	2	3
Ghostley, Minn. (Parmenter, Mass.).....	CNY	WL	Pearl	2	1	3	3	1	4	2	2	2
Ghostley, Minn. (Beamsdale, N. C.).....	N. C.	WL	Pearl	2	2	3	2	3	2	2	2	3
Wheelock, Penna.	Penna.	WL	Pearl	1	2	2	3	2	1	2	1	1
Ghostley, Minn.	R. I.	WL	Pearl	2	2	3	3	1	1	1	1	1
Ghostley, Minn.	Tenn.	WL	Pearl	4	4	4	2	3	1	4	2	1
Ghostley, Minn.	Texas	WL	Pearl	3	3	3	3	4	2	3	1	3
Ghostley, Minn. (Reid, Wisc.).....	Wisc.	WL	Pearl	3	3	3	3	3	3	3	2	2
Goetz, Eugene, Lakewood, New Jersey												
Goetz, N. J.	N. J.	WL	Commercial	2	2	2	1	4	2	1	1	3
Good's Poultry Farm, Indiana, Pennsylvania												
Good, Penna.	Penna.	WL	Good's	3	3	2	3	4	3	2	2	1
Great Plains Hatcheries, Effingham, Illinois												
Great Plains, Ill.	Mo.	RIR	PS Egg Master	1	2	3	2	1	1	3	3	3
Great Plains Hatcheries, Effingham, Illinois												
Great Plains, Ill.	Mo.	BX	Golden Cross	1	2	3	2	1	1	1	2	2
Groupe Maska, St. Hyacinthe, Quebec												
Groupe Maska, Que.	C. Can.	RIRxLS	Maska 42	3	3	2	3	3	2	4	4	3
Groupe Oka, Oka Two Mountains, Quebec												
Groupe Oka, Que.	C. Can.	WL	Oka 39	1	2	3	2	2	2	1	2	2
Hall Bros. Hatchery, Wallingford, Connecticut												
Hall, Conn.	Penna.	WL	Commercial	3	3	2	3	3	2	3	2	4
Hall, Conn.	R. I.	WL	Commercial	3	4	3	2	4	2	2	2	4
Hall Bros. Hatchery, Wallingford, Connecticut												
Hall, Conn.	WNY	WRxRIR	Silver Hallcross	2	3	2	4	2	2	3	3	3
Hansen's Leghorn City, Puyallup, Washington												
Hansen, Wash. (Robertson, B. C.).....	B. C.	WL	Criss Cross H 25	2	2	2	2	2	3	2	2	3
Hansen, Wash. (Bunker, Cal.).....	Cal. F	WL	Criss Cross H 25	2	2	2	3	1	3	3	2	3
Hansen, Wash. (Bunker, Cal.).....	Cal. C	WL	Criss Cross H 25		1	3		1	2	2	2	3
Hansen, Wash.	CNY	WL	Criss Cross H 25	3	3	3	3	4	3	2	3	4
Hansen, Wash.	Penna.	WL	Criss Cross H 25	1	2	3	2	3	3	1	3	1
Hansen, Wash.	Tenn.	WL	Criss Cross H 25	3	3	4	3	3	3	3	3	2
Hansen, Wash. (Young, Wisc.).....	Wisc.	WL	Criss Cross H 25	2	2	3	4	2	3	2	2	2

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEED COST (\$)	EGG PRO- DUCTION (NO.)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN EGGS (LBS)	ALBUMEN QUALITY (H.U.)	BLDGS (%)
Hansen's Leghorn City, Puyallup, Washington												
Del Rio, Ariz.	Ariz.	WL	Criss Cross	177	4	3	2	4	4	2	3	2
Hansen, Wash.	Mo.	WL	Criss Cross	177	2	2	3	2	3	2	3	4
Hansen, P., Poultry Breeding Farm, Fresno, California												
Hansen, Cal.	Cal. F	AW	BX	One Grade	3	3	3	1	2	1	3	1
Hansen, Cal.	Cal. C	AW	BX	One Grade	4	3	3	3	1	3	4	3
Hanson, J. A. & Son, Corvallis, Oregon												
Hanson, Ore.	Cal. F	WL	SX	Super Nick	3	3	3	3	4	3	2	3
Hanson, Ore.	Cal. C	WL	SX	Super Nick	4	4	3	3	3	3	2	4
Harco Orchards & Poultry Farms, So. Easton, Mass.												
Harco, Mass.	N. H.	RIRxBPR	Sex Link	1	2	1	2	2	1	2		
Harco, Mass.	WNY	RIRxBPR	Sex Link	1	2	1	1	3	1	1	3	2
Harco, Mass.	N. C.	RIRxBPR	Sex Link	3	2	1	3	3	1	3	3	2
Harco, Mass.	R. I.	RIRxBPR	Sex Link	1	1	2	1	1	1	2	3	3
Heisdorf & Nelson Farms, Kirkland, Washington												
Sun Valley, Ariz.	Ariz.	WL	Nick Chick	3	3	4	1	3	2	4	1	4
H&N, Wash. (H&N, Cal.)	Cal. F	WL	Nick Chick	1	1	3	3	1	2	1	1	3
H&N, Wash. (H&N, Cal.)	Cal. C	WL	Nick Chick	1	1	3	2	2	2	2	1	1
Pine Acres, Fla.	Fla.	WL	Nick Chick	1	1	1	2	1	2	2	2	1
H&N, Wash. (Bayse, Iowa)	Iowa	WL	Nick Chick	1	1	1	2	1	3	1	1	2
Lowry, Minn.	Minn.	WL	Nick Chick	1	1	1	2	1	4	2	2	2
H&N, Wash.	Mo.	WL	Nick Chick	3	3	1	3	1	3	3	1	2
H&N, Wash. (Castleberry, N. C.)	N. C.	WL	Nick Chick	1	1	1	2	1	4	2	1	2
Strain, Ga.	Tenn.	WL	Nick Chick	1	1	1	2	1	2	1	1	4
Vance, Texas	Texas	WL	Nick Chick	1	2	2	2	1	3	2	1	2
Williams, Texas	Texas	WL	Nick Chick	2	2	1	2	2	3	2	2	3
H&N, Wash. (Slette, Wisc.)	Wisc.	WL	Nick Chick	1	1	1	2	1	3	2	2	3
Heisdorf & Nelson Farms, Kirkland, Washington												
Sun Valley, Ariz.	Ariz.	WL	Mark II	3	4	2	2	2	1	3	1	2
H&N, Wash. (Kreiger, B. C.)	B. C.	WL	Mark II	2	2	1	2	1	1	2	2	1
H&N, Wash. (H&N, Cal.)	Cal. F	WL	Mark II	2	2	2	3	1	2	2	1	2
H&N, Wash. (H&N, Cal.)	Cal. C	WL	Mark II	1	1	3	1	1	2	2	1	2
Frizzell, Fla.	Fla.	WL	Mark II	1	1	2	1	1	1	2	2	2
H&N, Wash.	Mo.	WL	Mark II	1	1	3	3	1	2	1	1	1
H&N, Wash.	N. H.	WL	Mark II	2	2	2	1	4	3	2		
H&N, Wash. (H&N, Ind.)	CNY	WL	Mark II	2	2	2	1	2	1	3	1	1
Godshall, Penna.	Penna.	WL	Mark II	1	1	2	2	1	2	1	2	3
Erving, Tenn.	Tenn.	WL	Mark II	3	2	3	1	2	2	2	1	2
Atwood, Texas (H&N, Wash.)	Texas	WL	Mark II	3	3	2	3	3	1	3	1	1

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME FEED OVER CHICK COST	EGG PRO- DUCTION (Hens housed)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN PER 24-HR (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Heisdorf & Nelson Farms, Kirkland, Washington												
H&N, Wash. (H&N, Cal.)	Cal. F	SYNxWL	Breed Cross	3	3	2	1	3	1	2	3	2
H&N, Wash. (H&N, Cal.)	Cal. C	SYNxWL	Breed Cross		1	2		3	2		3	2
Hill Top Poultry Farm, Hawley, Pennsylvania												
Hill Top, Penna.	Penna	WL	SX #285	2	2	3	2	1	4	2	2	3
Hoggett Poultry Breeding Farm, Pomona, California												
Hoggett, Cal.	Cal. F	CGxWL	Hoggett	3	3	3	4	4	2	3	4	2
Hoggett, Cal.	Cal. C	CGxWL	Hoggett		4	2		4	3		3	1
Honegger Breeder Hatchery, Forrest, Illinois												
Honegger, Ill. (Kengsway, Alta.)	Alta.	WL	SX Honegger Layer	2	2	3	3	1	3	1	2	1
Honegger, Ill. (Fraser, B. C.)	B. C.	WL	SX Honegger Layer	1	2	3	2	2	2	1	3	1
Honegger, Ill. (Anderson, Cal.)	Cal. F	WL	SX Honegger Layer	2	2	3	3	3	3	1	2	3
Honegger, Ill. (Anderson, Cal.)	Cal. C	WL	SX Honegger Layer		2	3		3	3		2	3
Pine Air, Fla.	Fla.	WL	SX Honegger Layer	3	3	3	3	3	3	3	3	1
Honegger, Ill. (Isenberger, Iowa)	Iowa	WL	SX Honegger Layer		2	3	1	2	3		2	3
Peck, Minn.	Minn.	WL	SX Honegger Layer	2	2	4	2	3	4	3	3	
Honegger, Ill.	Mo.	WL	SX Honegger Layer	2	1	3	4	1	3	1	2	1
Honegger, Ill.	N. H.	WL	SX Honegger Layer	1	1	3	2	1	4	1		
Honegger, Ill. (Parenti, N. J.)	N. J.	WL	SX Honegger Layer	1	1	3		2	3	1	2	3
Honegger, Ill. (Ohls, N. Y.)	CNY	WL	SX Honegger Layer	4	4	3	1	4	4	3	2	3
Honegger, Ill. (FCX, N. C.)	N. C.	WL	SX Honegger Layer	2	2	4	3	2	3	2	2	1
Cunningham, Penna.	Penna.	WL	SX Honegger Layer	3	2	4	4	2	2	2	3	3
Honegger, Ill.	R. I.	WL	SX Honegger Layer	1	1	2	2	1	4	2	2	3
Honegger, Ill.	Tenn.	WL	SX Honegger Layer	3	3	4	2	3	2	4	3	3
Flinn, Texas	Texas	WL	SX Honegger Layer	3	3	4	2	3	2	3	3	3
Honegger, Ill. (Oats, Wisc.)	Wisc.	WL	SX Honegger Layer	3	3	4	1	2	3	3	2	2
Honegger Breeder Hatchery, Forrest, Illinois												
Pine Air, Fla.	Fla.	WL	SX Honegger Layer	62	3	2	2	4	4	3	2	2
Honegger, Ill.	Mo.	WL	SX Honegger Layer	62	2	1	2	3	4	1	2	1
Cochran, Tenn.	Tenn.	WL	SX Honegger Layer	62	3	3	2	4	4	3	2	2
Hubbard Farms, Walpole, New Hampshire												
Hubbard, N. H.	Cal. F	RIRxNH	H 496	3	3	3	4	3	1	4	3	1
Hubbard, N. H.	Cal. C	RIRxNH	H 496		2	3		3	2		2	1
Hubbard, N. H.	N. H.	RIRxNH	H 496	3	3	2	1	3	2	4		
Hubbard, N. H.	WNY	RIRxNH	H 496	2	2	1	1	3	3	3	3	1
Hubbard, N. H. (Hubbard, N. C.)	N. C.	RIRxNH	H 496	4	4	2	3	4	2	4	3	1
Hubbard, N. H.	Tenn.	RIRxNH	H 496	2	2	2	2	3	1	4	3	4
Hy-Line Poultry Farm, Des Moines, Iowa												
Hy-Line, Iowa (Preston, Wisc.)	Wisc.	INX	934 A	2	1	2	1	1	3	2	3	2

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEED AND CHICK COST (\$)	EGG PRO- DUCTION (Hens housed)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN 24-OZ EGGS (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Hy-Line Poultry Farm, Des Moines, Iowa												
Hy-Line, Iowa (Topper, Cal.)	Cal. F	INX	934 C	2	2	2	3	2	3	1	4	2
Hy-Line, Iowa (Topper, Cal.)	Cal. C	INX	934 C	2	2	1	1	1	2	1	4	2
Hy-Line, Iowa (Hy-Line, Ont.)	C. Can.	INX	934 C	1	1	1	1	1	2	1	4	1
Wallace, Fla.	Fla.	INX	934 C	2	2	3	1	3	3	2	4	3
Hy-Line, Iowa	Mo.	INX	934 C	2	1	2	1	2	1	2	1	1
Farvue, N. Y. (Neuhauser, N. Y.)	WNY	INX	934 C	2	2	1	2	2	1	1	4	3
Wallace, Penna.	Penna.	INX	934 C	2	2	3	1	2	2	2	3	3
Blanton Smith, Tenn.	Tenn.	INX	934 C	1	1	2	1	1	2	1	3	3
Hy-Line, Iowa (Preston, Wisc.)	Wisc.	INX	934 C	2	1	2	1	2	2	2	3	2
Hy-Line Poultry Farm, Des Moines, Iowa												
Rothway, Ariz.	Ariz.	INX	934 H	1	1	1	4	3	3	1	4	1
Rothway, Ariz.	Ariz.	INX	934 H	2	3	2	4	1	3	1	4	3
Hy-Line, Iowa	Cal. F	INX	934 H	1	1	1	1	2	3	1	4	1
Hy-Line, Iowa	Cal. C	INX	934 H	2	1	1	1	1	2	3	3	1
Wallace, Fla.	Fla.	INX	934 H	2	1	2	1	2	3	3	4	1
Corrigan, Fla.	Fla.	INX	934 H	2	1	2	1	2	3	2	4	1
Hy-Line, Iowa	Iowa	INX	934 H	1	1	1	1	1	2	1	4	1
Hy-Line, Minn.	Minn.	INX	934 H	1	1	1	3	1	2	1	4	1
Hy-Line, Iowa	Mo.	INX	934 H	2	1	1	4	2	3	1	3	1
Hy-Line, Iowa (Boyarin, N. J.)	N. J.	INX	934 H	4	4	2	2	4	4	2	4	1
Farvue, N. Y. (Hy-Line, Penna.)	CNY	INX	934 H	3	2	1	1	1	3	1	4	1
Hy-Line, Iowa (Belk, N. C.)	N. C.	INX	934 H	1	1	1	1	1	3	1	4	1
Wallace, Penna.	Penna.	INX	934 H	3	2	2	1	3	3	3	3	2
Hy-Line, Iowa (Wallace, Penna.)	R. I.	INX	934 H	3	2	2	2	2	4	2	4	1
Banks, Tenn.	Tenn.	INX	934 H	1	1	2	3	1	2	1	4	1
Hy-Lay, Texas (Hy-Cross, Penna.)	Texas	INX	934 H	1	1	1	1	1	3	1	4	1
Kazmeier, Texas (Hy-Line, Iowa)	Texas	INX	934 H	1	1	2	1	1	1	1	3	2
Wilson, Texas (Tar Heel, Texas)	Texas	INX	934 H	1	1	2	1	1	1	1	3	2
Ideal Hatchery & Poultry Farm, Cameron, Texas				1	1	1	3	1	2	1	4	1
Ideal, Texas	Cal. F	SX	H-3-W	2	2	2	1	2	2	2	2	3
Ideal, Texas	Cal. C	SX	H-3-W	2	2	1	2	1	2	1	1	4
Ideal, Texas (Healey, Iowa)	Iowa	WL	H-3-W	3	3	3	2	2	1	1	2	1
Ideal, Texas	Minn.	SX	H-3-W	1	2	2	1	2	2	2	2	1
Ideal, Texas	Mo.	SX	H-3-W	2	2	1	2	4	2	1	2	1
Ideal, Texas (Ideal, N. J.)	N. J.	WL	H-3-W	3	4	2	2	2	2	3	3	3
Ideal, Texas	CNY	WL	H-3-W	2	2	1	2	2	3	3	3	2
Ideal, Texas	Penna.	WL	H-3-W	3	3	2	2	3	3	2	3	1
Ideal, Texas	R. I.	WL	H-3-W	3	3	2	2	3	3	2	3	4
Ideal, Texas	Tenn.	WL	H-3-W	3	3	2	2	4	2	2	3	3
Ideal, Texas	Texas	WL	H-3-W	3	3	3	3	4	2	2	2	3
D & C, Texas	Texas	WL	H-3-W	2	2	2	3	3	2	2	2	3
Golden Oak, Texas	Texas	WL	H-3-W	2	2	2	3	3	2	2	2	3
Ideal, Texas	Texas	WL	H-3-W	2	3	1	2	3	2	2	3	1

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEED AND CHICK CDST (\$)	EGG PRO- DUCTION (hen housed)	AGE AT Laying (days)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (oz)	FEED PER DOZEN 24-DZ (lbs)	ALBUMEN QUALITY (H.U.)	BLDD SPOTS (%)
Kerr, Dr., Hatcheries, Minneota, Minnesota	Mo.	WL	IN 409 C	1	1	1	2	1	2	2	3	2
Kerr, Minn.	.....										
Keystone Poultry Breeding Farm, Ephrata, Penna.	CNY	WL	SX Keystone	2	3	4	1	4	3	2	3	2
Keystone, Penna.	.....										
Keystone, Penna.	Penna.	WL	SX Keystone	1	1	3	2	2	2	2	3	1
Kimber Farms, Fremont, California												
Ariz. State, Ariz.	Ariz.	WL	SX K 137	1	2	4	1	1	2	2	1	1
Kimber, Cal. (Derreen, B. C.)	B. C.	WL	SX K 137	1	2	1	2	1	1	1	1	1
Kimber, Cal.	Cal. F	WL	SX K 137	2	2	1	1	1	2	2	1	3
Kimber, Cal.	Cal. C	WL	SX K 137	2	2	1	2	2	3	1	2	2
Florida State, Fla.	Fla.	WL	SX K 137	1	1	1	1	1	1	2	1	3
Bloomingtondale, Fla.	Fla.	WL	SX K 137	3	3	2	1	4	2	3	2	4
Kimber, Cal.	Mo.	WL	SX K 137	3	3	2	1	1	2	3	2	3
Kimber, Cal.	N. H.	WL	SX K 137	1	1	1	3	2	3	1	1	3
Kimber, Cal. (Marshall, N. Y.)	CNY	WL	SX K 137	2	2	1	3	1	3	2	1	3
Kimber, Cal. (Hubbard, N. C.)	N. C.	WL	SX K 137	2	2	2	2	2	2	2	1	3
Longenecker, Penna.	Penna.	WL	SX K 137	1	2	2	2	2	2	1	2	4
Kimber, Cal.	Tenn.	WL	SX K 137	2	2	1	2	2	2	2	2	2
Western, Texas	Texas	WL	SX K 137	2	2	2	2	3	2	2	2	3
Kimber, Cal. (Prospect, Wisc.)	Wisc.	WL	SX K 137	3	4	2	3	3	1	4	1	4
Kimber Farms, Fremont, California												
Kimber, Cal.	Cal. F	WL	SX K 141	2	2	2	1	3	3	1	2	3
Kimber, Cal.	Cal. C	WL	SX K 141	2	2	2	2	2	3	2	2	3
Kimber Farms, Fremont, California												
Ariz. State, Ariz.	Ariz.	WL	SX K 155	2	2	1	1	1	1	2	1	4
Miami International, Fla.	Fla.	WL	SX K 155	2	1	1	3	2	2	2	2	4
Kimber, Cal. (Trettin, Iowa)	Iowa	WL	SX K 155	2	1	1	3	2	3	2	2	3
Kimber, Minn.	Minn.	WL	SX K 155	1	2	1	1	2	3	3	2	2
Kimber, Cal.	Mo.	WL	SX K 155	2	1	1	3	1	3	2	2	2
Kimber, Cal. (Dover, N. J.)	N. J.	WL	SX K 155	1	1	1	2	2	3	1	2	1
Hubbard, Penna.	Penna.	WL	SX K 155	1	2	2	1	2	2	1	2	2
Kimber, Cal. (Hubbard, Penna.)	R. I.	WL	SX K 155	1	1	1	3	1	3	1	2	2
Nichols, Tenn.	Tenn.	WL	SX K 155	2	2	1	3	2	2	2	1	3
Kimber, Cal.	Texas	WL	SX K 155	3	2	1	1	2	2	3	2	2
Kimber, Cal. (Manwaring, Ind.)	Wisc.	WL	SX K 155	4	4	1	2	4	3	4	1	1
King Leghorn Farm Hatchery, Thayer, Missouri												
King, Mo.	Mo.	WL	SX King-Line 100	1	2	3	4	2	2	1	3	2
Kingstown Poultry Farm, North Kingstown, R. I.												
Kingstown, R. I.	R. I.	RIR	PS Kingstown	4	4	4	2	3	1	3	2	4

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEE AND CHICK COST (\$)	EGG PRO- DUCTION (Hen housed)	AGE AT 50% PRO- DUCTION (Days)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (Oz)	FEED PER DOZEN PER 24-HR. (Lb.)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Klongland Hatchery, Stoughton, Wisconsin	Wisc.	CGxWL BX	K Cross	1	2	1	2	1	1	2	4	1
Klongland, Wisc.												
Kruger's Poultry Breeding Farm, Dinuba, California	Cal. F	WL	SX Commercial	4	3	3	3	4	3	3	2	4
Kruger, Cal.	Cal. C	WL	SX Commercial		4	4		3	2		3	4
Kruger, Cal.												
Lambert, M., Bright, Ontario	C. Can.	RIRxCR	Gold Cross	2	2	3	2	2	3	3	2	4
Lambert, Ont.												
Lawton, A. C. & Sons, Foxboro, Massachusetts	WNY	WPR	PS Certified Cand.	4	4	4	2	1	2	4	4	2
Lawton, Mass.												
Lawton, A. C. & Sons, Foxboro, Massachusetts	N. H.	RIRxWPR	Buff Sex Link	2	2	4	1	1	1	3		
Lawton, Mass.	R. I.	RIRxWPR	Buff Sex Link	2	1	2	1	1	1	2	4	1
Leader, Guy A. & Sons, York, Pennsylvania	Penna.	WL	SX 8X	1	2	2	2	1	3	2	2	1
Leader, Penna.												
Leader, Guy A. & Sons, York, Pennsylvania	N. J.	WL	SX 14X	3	4	3		2	2	3	1	3
Leader, Penna.	WNY	WL	SX 14X	4	4	3	4	3	2	4	2	1
Leader, Penna.	Penna.	WL	SX 14X	2	3	3	2	2	2	1	2	1
Leader, Penna.												
Lee's Poultry Farm, Brookville, Ohio	Penna.	WPR	PS Lee	4	4	2	4	3	2	4	3	4
Lee, Ohio												
Liechty's Poultry Farm, Wauseon, Ohio	Mo.	WL	SX L 240	3	3	3	2	1	3	3	2	3
Liechty, Ohio												
Lone Pine Farm, Berwick, Nova Scotia	C. Can.	RIRxLS	Lone Pine	3	4	4	2	3	2	4	2	3
Lone Pine, N. S.												
Lux Leghorn Land Farms, Hopkinton, Iowa	Mo.	WL	SX H-D-6	3	3	3	1	1	3	3	3	1
Lux, Iowa	Wisc.	WL	SX H-D-6	2	2	2	4	3	3	2	3	2
Lux, Iowa												
Manitoba ROP Hatchery, Winnipeg, Manitoba	C. Can.	BRxWL	Keyline	4	4	2	3	4	2	4	4	3
Manitoba, Man.												
Manitoba ROP Hatchery, Winnipeg, Manitoba	C. Can.	BRxLS	Keyline 230	4	4	2	4	4	3	4	4	4
Manitoba, Man.												
Manitoba ROP Hatchery, Winnipeg, Manitoba	B. C.	WL	SX Keyline 110	3	3	2	3	3	1	3	2	1
Manitoba, Man.	C. Can.	WL	SX Keyline 110	2	3	1	3	3	1	1	2	2
Manitoba, Man.												
Mathews Poultry Farm, Burlington, Wisconsin	Wisc.	WL	SX M 138	3	3	4	4	2	1	3	2	4
Mathews, Wisc.												
Merryknoll Farms, Attleboro, Massachusetts	N. H.	BX	Merryknoll 400	3	4	4	2	3	1	3		
Merryknoll, Mass.												
Midwest Poultry Farm, Marshall, Missouri	Mo.	WL	PS Best Egg Grade	3	3	2	1	1	2	3	2	2
Midwest, Mo.												

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEE AND CHICK COST (\$)	EGG PRO- DUCTION (NO. (fem housed))	AGE AT ONSET OF PRODUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	T EGG PER DOZEN (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Midwest Poultry Farm, Marshall, Missouri	Mo.	RIR	PS Prod. Red	3	3	3	2	3	3	4	3	1
Midwest, Mo.												
Miner Hatchery, New Providence, Iowa	Iowa	WL	SX Minear M		4	3	3	4	4		2	4
Miner, Iowa												
Missouri Valley Hatchery, Marshall, Missouri	Mo.	WL	PS Best Egg Contest	1	2	2	3	1	2	1	2	2
Missouri Valley Hatchery, Marshall, Missouri												
Missouri Valley Hatchery, Mo.	Mo.	BX	Ski Line Layers	3	3	2	2	3	2	3	2	3
Missouri Valley, Mo.												
Niles Poultry Breeding Farm, Niles, California	Cal. F	WL	SX Niles	4	3	3	1	2	2	2	2	3
Niles, Cal.	Cal. C	WL	SX Niles		3	3		1	2		2	2
Niles, Cal.												
Niles Poultry Breeding Farm, Niles, California	Cal. F	CGxWL	Commercial	3	2	1	3	1	2	3	3	3
Niles, Cal.	Cal. C	CGxWL	Commercial		2	3		3	2		3	2
Niles, Cal.												
Noble Bros., Orangeville, Ontario	C. Can.	WL	SX N-60	2	2	3	2	1	3	2	3	2
Noble, Ont.												
Nolin, E., Victoriaville, Quebec	C. Can.	WL	SX Nolin 41	2	2	3	2	2	3	2	3	1
Nolin, Que.												
Norco Poultry Breeding Farm, Norco, California	Cal. F	WL	PS Grade A	3	3	3	3	2	2	3	2	3
Norco, Cal.	Cal. C	WL	PS Grade A		3	3		3	2		1	3
Norco, Cal.												
Norris, Vernon, Valencia, Pennsylvania	Penna	WL	PS Efficiency Leg.	3	3	4	2	2	3	2	1	1
Norris, Penna.												
North Central Regional Lab., Lafayette, Indiana	Cal. F	RIRxWL	Random Bred X	4	4	3	1	4	3	4	3	1
North Central, Ind.	Cal. C	RIRxWL	Random Bred X		3	2		2	4		3	3
North Central, Ind.												
North Central Regional Lab., Lafayette, Indiana	R. I.	RIR	PS Random Bred Red	4	4	3	4	3	4	4	2	1
North Central, Ind.												
North Iowa Hatcheries, Osage, Iowa	Mo.	BX	Lanco 404	2	3	2	3	2	2	3	4	3
North Iowa, Iowa												
Ontario Agricultural College, Guelph, Ontario	B. C.	WL	SX Strain Cross	2	3	4	1	2	2	1	3	1
Ontario, Ont.												
Ottawa Central Experimental Farm, Ottawa, Ontario	WL	PS Random Bred		4	3	4	3	2	4	4	1	2
Ottawa, Ont.	C. Can.	WL	PS Random Bred	4	3	3	2	3	4	3	2	1
Ottawa, Ont.	C. Can.	WL	PS Random Bred	3	3	3	2	3	4	3	2	2
Ottawa, Ont.	WNY	WL	PS Random Bred	4	2	3	2	3	4	3	2	2

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEED COST CHICK (\$)	EGG PRO- DUCTION (No.)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN 24-OZ (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Parmenter Reds, Inc., Franklin, Massachusetts												
Parmenter, Mass.	N. H.	RIR	SX PM 1	3	3	3	4	2	3	3		
Parmenter, Mass.	WNY	RIR	SX PM 1	2	3	3	1	4	2	2	2	1
Parmenter, Mass. (Belk, N. C.)	N. C.	RIR	SX PM 1	4	4	3	3	3	2	4	3	2
Parmenter, Mass.	R. I.	RIR	SX PM 1	2	2	4	2	2	3	3	3	1
Parmenter Reds, Inc., Franklin, Massachusetts												
Parmenter, Mass.	Penna.	DWxRIR	Mass. White	3	4	2	2	4	2	3	3	3
Peerless Hatchery, Spencer, Iowa												
Peerless, Iowa	Mo.	WL	SX Commercial	3	3	3	3	4	4	3	2	3
Peerless Hatchery, Spencer, Iowa												
Peerless, Iowa	Mo.	WL	SX Peerless 262	2	1	3	3	3	3	2	2	2
Penna. Farm Bureau Hatchery, Harrisburg, Penna.												
Penna. F. B., Penna.	WNY	WL	SX LSC 55	2	3	2	3	3	2	1	2	3
Penna. F. B., Penna.	Penna.	WL	SX LSC 55	2	2	2	2	2	2	3	1	4
Penna. Farm Bureau Hatchery, Harrisburg, Penna.												
Penna. F. B., Penna.	Penna.	WL	SX LSC 60	1	1	2	1	1	3	1	1	3
Pillsbury Company, Clinton, Iowa												
Oak Crest, Fla.	Fla.	WL	SX Maxi Lay Queen	3	3	4	2	3	1	3	2	4
Oak Crest, Fla.	Fla.	WL	SX Maxi Lay Queen	2	3	4	3	3	2	2	2	1
Pillsbury, Minn.	Mo.	WL	SX Maxi Lay Queen	3	3	2	1	2	2	2	2	3
Pillsbury, Iowa	Tenn.	WL	SX Maxi Lay Queen	3	3	4	3	2	2	3	1	2
Purdy, Miss H. M., Balcarres, Saskatchewan												
Purdy, Sask.	C. Can.	BR(LSxBR)	Heavy Cross	4	4	3	3	4	2	4	3	3
Randall Hatchery & Breeding Farm, Montclair, Calif.												
Randall, Cal.	Cal. F	CGxWL	Randall	2	2	2	3	3	3	2	3	2
Randall, Cal.	Cal. C	CGxWL	Randall		1	2		2	3		3	2
Randall Hatchery & Breeding Farm, Montclair, Calif.												
Randall, Cal.	Cal. F	RIR	Randall	3	3	2	4	4	2	3	3	1
Randall, Cal.	Cal. C	RIR	Randall		1	2		1	2		3	2
Rapp Leghorn Farm, Farmingdale, New Jersey												
Maple Leaf, Fla.	Fla.	WL	Rapp Linecross	3	3	4	3	2	2	3	3	3
Rapp, N. J. (Thorpe, Iowa)	Iowa	WL	Rapp Linecross		2	3	3	2	2		3	1
Rapp, N. J.	Mo.	WL	Rapp Linecross	4	4	3	1	2	3	4	2	1
Rapp, N. J.	N. J.	WL	Rapp Linecross	3	3	3	1	1	3	3	1	2
Rapp, N. J. (Kostinen, N. Y.)	CNY	WL	Rapp Linecross	2	2	3	2	2	4	2	3	1
Rapp, N. J. (Quinn, N. C.)	N. C.	WL	Rapp Linecross	2	3	4	4	3	3	2	3	3
Rapp, N. J.	Penna.	WL	Rapp Linecross	3	3	3	1	2	2	3	3	3
Rapp, N. J.	Tenn.	WL	Rapp Linecross	3	3	3	4	2	2	2	2	1
Rapp, N. J. (Dalzell, Wisc.)	Wisc.	WL	Rapp Linecross	3	4	4	3	3	2	4	1	2

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEED AND CHICK COST (\$)	EGG PRO- DUCTION (hen housed)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN PER 24-HR. (LBS)	ALBUMEN QUALITY (H.U.)	BLOOD SPOTS (%)
Raynor, Ralph, Charlottetown, Prince Edward Island												
Raynor, P. E. I.	C. Can.	WL	SX	Raynor R-60	2	3	2	1	3	2	2	2
Richardson Poultry Breeding Farm, Redlands, Calif.												
Richardson, Cal.	Cal. F	WA	BX	Commercial	3	2	2	4	3	4	3	2
Richardson, Cal.	Cal. C	WA	BX	Commercial	2	2	2	3	4	4	4	2
Richardson Poultry Breeding Farm, Redlands, Calif.												
Richardson, Cal.	Cal. F	WA	BX	Commercial MWA	3	3	2	3	2	3	4	2
Richardson, Cal.	Cal. C	WA	BX	Commercial MWA	3	3	3	3	2	2	3	2
Riddle Spring Poultry Farm, Manchester, N. H.												
Riddle Spring, N. H.	N. H.	BX	Super-Triway	2	3	2	3	1	2	3		
Riddle Spring, N. H.	R. I.	BX	Super-Triway	3	3	2	2	3	2	3	2	1
Scattered Acres Hatchery, Hanover, Ontario												
Scattered Acres, Ont.	C. Can.	WL(BLxLS)	Hanover 30	2	2	2	1	1	2	2	2	2
Schaible, Louis D., Shiloh, New Jersey												
Schaible, N. J.	Mo.	WL	SX	Commercial	4	4	3	3	2	3	4	1
Schaible, N. J.	N. J.	WL	SX	Commercial	2	3	3	3	2	1	3	3
Schaible, N. J.	CNY	WL	SX	Commercial	2	2	4	1	2	2	2	2
Schaible, N. J.	Penna.	WL	SX	Commercial	1	2	3	2	1	2	1	2
Schaible, N. J.	R. I.	WL	SX	Commercial	4	4	3	4	3	2	2	3
Schaible, N. J.	Tenn.	WL	SX	Commercial	2	2	3	3	1	2	2	1
Schaible, N. J.	Texas	WL	SX	Commercial	3	4	3	4	3	3	4	1
Schaible, Louis D., Shiloh, New Jersey												
Schaible, N. J.	Mo.	WL	SX	Commercial 2	3	3	2	2	2	3	3	3
Schaible, Louis D., Shiloh, New Jersey												
Schaible, N. J.	Penna.	RIR	PS	Schaible	3	3	2	4	3	2	3	2
Schildmeyer's Poultry Breeding Farm, Orange, Calif.												
Schildmeyer, Cal.	Cal. F	CGxWL	Commercial	3	2	1	3	1	3	3	4	3
Schildmeyer, Cal.	Cal. C	CGxWL	Commercial	2	1	1	3	3	3	3	3	3
Schuyler Poultry Farms, LeRoy, New York												
Schuyler, N. Y.	WNY	WL	SX	Egg Champs	3	3	2	3	1	3	3	3
Shaver Poultry Breeding Farm, Galt, Ontario												
Shaver, Ont.	Alta.	WL	SX	Starcross 288	1	2	3	2	2	1	2	1
Shaver, Ont. (Grandview, B. C.)	B. C.	WL	SX	Starcross 288	2	3	4	1	2	2	2	1
Shaver, Ont.	Cal. F	WL	SX	Starcross 288	2	2	4	3	2	1	2	2
Shaver, Ont.	Cal. C	WL	SX	Starcross 288	1	4	4	2	2	2	2	3
Shaver, Ont.	C. Can.	WL	SX	Starcross 288	2	2	2	2	2	1	1	2
Shaver, Ont.	Mo.	WL	SX	Starcross 288	1	1	3	2	1	1	3	3
Shaver, Ont.	WNY	WL	SX	Starcross 288	1	1	2	3	1	1	3	3
Shaver, Ont.	Penna.	WL	SX	Starcross 288	2	2	3	3	2	2	3	3
Greider, Penna.	R. I.	WL	SX	Starcross 288	1	1	3	2	1	1	3	4
Shaver, Ont.	Tenn.	WL	SX	Starcross 288	2	2	3	2	2	1	2	2

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	IN COM- MON FEED COST (\$)	NON- PRO- DUCTION (Hens housed)	(LAYS) % AT DUCTION	(%) GROWING MORTALITY	(%) LAYING MORTALITY	(OZ.) EGG WEIGHT	(LBS.) FEED PER DOZEN 24-OZ.	(H.U.) ALBUMEN QUALITY	(%) BLOOD SPOTS
Shaver Poultry Breeding Farm, Galt, Ontario	Penna.	WL	SX 3-W	3	3	2	2	3	3	2	2	1
Greider, Penna.												
Sierra Farms Hatchery, Riverside, California	Cal. F	CGxWL	Silver Gray	2	2	2	3	3	2	2	4	2
Sierra, Cal.	Cal. C	CGxWL	Silver Gray		1	1		1	2		3	3
Sierra, Cal.												
Smyth, James, Nanaimo, B. C.	B. C.	WL	SX Smyth	3	3	3	3	1	4	3	4	4
Smyth, B. C.												
Starline Breeders Hatchery, Saskatoon, Saskatchewan	C. Can.	CGxWL	Pearlette	1	1	1	1	1	3	2	3	1
Starline, Sask.												
Stone's Poultry Farm, Dinuba, California	Cal. F	WL	SX H 56	1	1	2	1	1	1	1	2	1
Stone, Cal.	Cal. C	WL	SX H 56		3	2		2	2		2	2
Stone, Cal.												
Stone Bros. Hatchery, Medelia, Minnesota	Minn.	WL	SX Stone 158	1	2	1	1	2	2	2	3	
Stone, Minn.												
Sunnyside Hatchery, Watertown, Wisconsin	Wisc.	CGxWL	Wisco White	2	2	3	1	2	3	2	4	1
Sunnyside, Wisc.												
Swift & Co., Chicago, Illinois	Minn.	WL	SX Ski-Hi 316	3	2	4	2	2	2	3	3	
Swift, Minn.												
Swift, Texas	Wisc.	WL	SX Ski-Hi 316	1	1	3	1	2	1	2	2	2
Swift, Wisc. (Swift, Wisc.)					1	2	2	2	1	1	2	2
Townline Poultry Farm, Zeeland, Michigan	Mo.	WL	SX SC 30	2	2	3	2	1	3	3	2	3
Townline, Mich.	Penna.	WL	SX SC 30	3	3	3	3	2	4	3	3	1
Townline, Mich.												
Triska, Eric, Edmonton, Alberta	Alta.	WL	SX Belmont 292A	1	1	4	1	1	3	1	3	2
Triska, Alta.	C. Can.	WL	SX Belmont 292A	2	2	2	3	2	3	2	3	2
Triska, Alta.												
Triska, Eric, Edmonton, Alberta	Alta.	WL	SX Belmont 292B	1	1	4	1	2	3	1	2	1
Triska, Alta.												
Truway Farms, East Berlin, Pennsylvania	CNY	WL	SX Trubred 21	1	2	3	1	1	1	2	1	2
Truway, Penna.	Penna.	WL	SX Trubred 21	4	4	4	3	3	2	3	2	3
Truway, Penna.												
University of Missouri, Columbia, Missouri	Mo.	WL	PS Intra-Flock	3	3	3	4	3	3	3	3	2
University of Missouri, Mo.												
Vancrest Farms, Hyde Park, New York	WNY		BX All Red	3	3	4	2	3	3	4	1	3
Vancrest, N. Y.												
Vancrest Farms, Hyde Park, New York	CNY	WL	SX MB	1	2	3	2	2	2	2	3	4
Vancrest, N. Y.												
Ward Poultry Farm, Independence, Iowa	Iowa		BX Wardcrost 356		3	2	1	1	2		3	3
Ward, Iowa	Mo.		BX Wardcrost 356	3	3	3	1	4	3	3	3	3
Ward, Iowa												

QUARTILE RANK OF ENTRIES IN RANDOM SAMPLE EGG PRODUCTION TESTS (Cont'd.)

ENTRY IDENTIFICATION	TEST	BREED	STOCK	INCOME OVER FEE AND CHICK COST (\$)	NO. EGGS PRODUCED (NO.)	AGE AT 50% PRO- DUCTION (DAYS)	GROWING MORTALITY (%)	LAYING MORTALITY (%)	EGG WEIGHT (OZ)	FEED PER DOZEN PER OZ.	ALBUMEN QUALITY (H.U.)	BL- SPOTS (%)
Warren, J. J., North Brookfield, Massachusetts												
Dirkse, Mich.	Mo.	WL	Warren-Darby DX	2	3	3	1	2	3	3	3	2
Dirkse, Mich.	R. I.	WL	Warren-Darby DX	2	2	3	1	3	3	2	2	2
Dirkse, Mich.	Tenn.	WL	Warren-Darby DX	4	4	4	3	4	2	4	3	3
Warren, J. J., North Brookfield, Massachusetts												
Dirkse, Mich.	Mo.	WL	Warren-Darby Pure 2	2	2	3	4	3	2	2	2	2
Dirkse, Mich.	Penna.	WL	Warren-Darby Pure 1	1	1	2	2	1	3	1	3	3
Dirkse, Mich.	Wisc.	WL	Warren-Darby Pure 2	3	3	4	3	2	1	3	1	3
Warren, J. J., North Brookfield, Massachusetts												
Warren, Mass. (Bundesen, Cal.)	Cal. F	RIRxRIW	Sex-Sal-Link	3	4	3	3	3	1	4	3	1
Warren, Mass. (Bundesen, Cal.)	Cal. C	RIRxRIW	Sex-Sal-Link	2	2	2	1	3	3	2	2	2
Warren, Mass. (Swift, Iowa)	Iowa	RIRxRIW	Sex-Sal-Link	4	4	3	3	3	1	1	1	2
Warren, Mass.	N. H.	RIRxRIW	Sex-Sal-Link	2	3	4	2	2	2	2	2	2
Warren, Mass.	WNY	RIRxRIW	Sex-Sal-Link	1	2	4	2	2	1	1	2	1
Warren, Mass. (Warren, S. C.)	N. C.	RIRxRIW	Sex-Sal-Link	4	4	4	1	3	2	3	3	1
Swift, Wisc. (Swift, Wisc.)	Wisc.	RIRxRIW	Sex-Sal-Link	3	4	4	4	3	1	4	3	4
Warren, J. J., North Brookfield, Massachusetts												
Warren, Mass. (Bundesen, Cal.)	Cal. F	WLxSYN	Warren J-J	2	2	3	3	2	3	1	2	3
Warren, Mass. (Bundesen, Cal.)	Cal. C	WLxSYN	Warren J-J	2	2	2	3	3	4	3	3	3
Warren, Mass.	Minn.	WLxSYN	Warren J-J	2	2	3	2	2	3	3	3	3
Warren, Mass. (Petrini, N. J.)	N. J.	WLxSYN	Warren J-J	3	4	4	4	4	4	3	3	3
Warren, Mass.	Penna.	WLxSYN	Warren J-J	3	3	3	3	3	3	3	3	3
Warren, Mass.	Tenn.	WLxSYN	Warren J-J	3	4	4	2	3	4	3	3	2
Webster Poultry Farms, Auburn, New York												
Webster, N. Y.	WNY	RIR	PS Certified	2	2	3	2	2	3	3	2	1
Wells, George E. & Son, Inc., New Milford, Conn.												
Wells, Conn.	N. H.	RIRxBPR	Black Sex Link	4	4	4	1	3	3	4		
Welp's Breeding Farm, Bancroft, Iowa												
Welp, Iowa	Cal. F	INX	341	3	3	2	1	3	3	2	2	3
Welp, Iowa	Cal. C.	INX	341	2	2	2	2	2	3	3	3	3
Welp's Breeding Farm, Bancroft, Iowa												
Welp, Iowa	Iowa	WL	901	2	2	2	2	3	2	3	3	4
Wirtz Bros. Leghorn Farm, Lebanon, New Jersey												
Wirtz, N. J.	N. J.	WL	LX Linecross	3	3	4		1	2	4	2	4
Wirtz, N. J.	CNY	WL	LX Linecross	4	4	3	4	3	3	4	2	4
Wirtz, N. J.	Penna.	WL	LX Linecross	3	3	4	2	3	3	3	2	2
Wood Poultry Breeding Farm, Pomona, California												
Wood, Cal.	Cal. F	AW	BX Commercial	3	3	2	1	3	3	3	1	1
Wood, Cal.	Cal. C	AW	BX Commercial	1	2	2	1	1	3	2	2	2

OFFICIAL STANDARD EGG LAYING TESTS
1960-61

Connecticut - Storrs Egg Laying Test, Storrs, F. A. Ryan, Supervisor.

Missouri - Missouri Egg Laying Test, Mountain Grove, Noel Hall, Supervisor.

New York - New York State Egg Laying Test, Farmingdale, Long Island, R. R. Stockbridge, Supervisor.

NOTE: The Connecticut Test was discontinued at the end of the 1960-61 test.

Three Official Standard Egg Laying Tests operate under a uniform set of rules which were adopted by and are revised by the Council of American Official Poultry Tests. It must be recognized that these rules cover only certain phases of the test procedures. Such things as feeding programs, lighting and other management details are determined by the local test supervisor.

It also should be recognized that mature pullets are entered in standard tests. This means that each breeder hatched, reared and selected his entries under environmental conditions different from those of other competitors. Consistently good or poor performance at Standard tests may be due, in part, to these differences in environment prior to the time the pullets are shipped to the tests.

Egg production during the 1960-61 test year averaged approximately the same as for the previous year. The total number of birds was less than half that of the previous year. Mortality was about one percent lower than for the 1959-60 group. One test did not report egg size and hence that figure does not appear for all entries.

PRODUCTION SUMMARY OF EACH
U. S. OFFICIAL EGG LAYING TEST FOR 1960-61

Test	No. of Birds Entered	Points Per Bird	Eggs Per Bird	Per Cent Mortality	Ave. Egg Size Oz. /Doz.
Connecticut (Storrs)	234	276.28	259.36	6.84	25.68
Farmingdale (New York)	429	253.86	242.75	9.56	24.33
Missouri	650	248.61	242.56	6.31	-----
All Tests	1,313	255.26	245.62	7.46	24.81

PRODUCTION SUMMARIES OF ALL ENTRIES IN U. S.
OFFICIAL EGG LAYING TESTS FOR 1960-61 BY BREEDS

Breed	No. of Birds Entered	Points Per Bird	Eggs Per Bird	Per Cent Mortality	Ave. Egg Size Oz. /Doz.
Barred Plymouth Rocks	52	288.89	270.27	5.77	25.31
Crossbreds	247	277.52	260.73	6.48	25.44
Rhode Island Reds	156	264.99	249.92	5.77	25.62
Incrossbreds	52	259.89	251.33	7.69	24.49
White Leghorns	676	252.23	245.98	7.54	23.98
White Plymouth Rocks	52	231.06	220.03	7.69	24.54
New Hampshires	26	218.49	221.96	0.00	-----
Brown Leghorns	39	168.12	162.74	20.51	-----
Columbian Plymouth Rocks	13	155.14	164.53	23.08	-----
All Breeds	1,313	255.26	245.62	7.46	24.81

ALL TIME HIGH INDIVIDUAL RECORDS FOR EACH BREED IN ALL U. S. STANDARD TESTS
(BASED ON TOTAL POINTS)

<u>Breed</u>	<u>Year*</u>	<u>Test</u>	<u>Owner</u>	<u>Points</u>	<u>Eggs</u>
S. C. Wh. Leg.	1949-50	West. N. Y.	J. A. Hanson & Son, Corvallis, Ore.	381.35	353
S. C. Wh. Leg.	1956-57	Hunt.	Stern Bros., So. Vineland, N. J.	372.15	347
Bf. Leg.	1942-43	Okla.	Ward's Poul. Fm., Guthrie, Okla.	247.90	241
Bl. Leg.	1949-50	N. J. Hunt.	A. E. Hampton, Pittstown, N. J.	291.40	275
Br. Leg.	1950-51	Texas	Hogan Fms. Hty., Muskogee, Okla.	318.25	294
Exch. Leg.	1933-34	Florida	Harry L. Day, Hudson, S. D.	261.55	265
R. C. Wh. Leg.	1927-28	Missouri	Mrs. W. Cross, Hattie, Mo.	.....	242
R. L. Red	1942-43	West. N. Y.	E. B. Parmenter, Franklin, Mass.	386.10	351
R. C. R. L. Red	1940-41	Texas	Iowa Master Breeders, Sioux Falls, S. D.	314.45	289
R. L. White	1938-39	Texas	Blue Ribbon Fms., Sabetha, Kan.	247.75	225
N. Hamp.	1949-50	Maine	Arnold Whittaker, Stratham, N. J.	374.65	344
N. H. White	1941-42	Missouri	Imperial Br'g. Farm, Ottumwa, Iowa	287.55	265
Bar. P. Rock	1951-52	Conn.	David Cohen, Guilford, Conn.	369.75	338
Wh. P. Rock	1943-44	Florida	Colonial Poul. Fm., Pleasant Hill, Mo.	354.90	326
Col. P. Rock	1951-52	R. L.	Clyde A. Rano, Farley, Mass.	301.70	285
Buff P. Rock	1932-33	N. Y. St.	Far-A-Way Farm, Royfersford, Pa.	254.00	239
Part. Rock	1941-42	Florida	F. G. Romance, Cienaga, Havana, Cuba	157.60	153
R. C. B. Rock	1928-29	Yst. Fm.	Wenger & Miller, S. English, Iowa	.....	142
Ancona	1941-42	Penna.	Raymond Thomas, Saltillo, Pa.	328.40	300
Bl. Aust.	1948-49	Okla.	Watkins Qual. Hty., Vici, Okla.	331.85	313
Bf. Aust.	1935-36	N. Y. St.	Capt. B. Clarke, Hempstead, L. I. N. Y.	201.25	205
W. Wyan.	1931-32	Conn.	Eben Wood, W. Bridgewater, Mass.	333.00	313
S. L. Wyan.	1948-49	Maine	Wellington Wells, Millis, Mass.	280.85	259
Col. Wyan.	1931-32	Florida	S. H. Palmer, Lake Como, Fla.	224.00	231
Buff Wyan.	1930-31	Ala.	Far-A-Way Fm., Royfersford, Pa.	240.05	230
Wh. Min.	1939-40	Texas	T. D. Brown, Tulsa, Okla.	329.20	301
Bl. Min.	1936-37	Texas	E. J. Covey, Everman, Tex.	294.95	278
Bf. Min.	1931-32	N. J. Pass.	Charles Lathrop, Danville, N. J.	277.60	242
J. W. Giant	1949-50	R. L.	Willow Bud Hty., Westerly, R. L.	309.90	299
J. B. Giant	1932-33	R. L.	Sunny Ridge Farm, Kingston, R. L.	266.80	244
Bf. Orp.	1946-47	N. Y. St.	Capt. B. Clarke, Hempstead, L. I. N. Y.	296.50	274
Wh. Orp.	1925-26	N. J. Vine.	J. L. Lyle, Plainfield, N. J.	.....	301
Lamona	1940-41	Conn.	S. E. Raymond, Chardon, Ohio	282.80	265
L. Brahma	1940-41	Texas	Superior Hty., Windsor, Mo.	284.45	270
S. Camp.	1935-36	N. J. Hunt.	Bestcroft, Galra, Ill.	203.05	195
Lac. Barn.	1945-46	N. Y. St.	Walter Dobe, Buffalo, N. Y.	276.40	254
Wh. Barn.	1933-34	Maine	A. D. Arnold, W. Saugerties, N. Y.	236.00	249
Sp. Sussex	1930-31	Texas	R. A. Padgett, Rich Hill, Mo.	208.40	201
Lt. Sussex	1950-51	Maine	Miriam B. Parlin, Englewood, N. J.	308.20	288
Houdan	1930-31	N. J. Pass.	Skyland Farm, Sterlington, N. Y.	215.55	204
Hamburg	1956-57	Okla.	A. M. Stodel, Van Nuys, Calif.	209.20	216
Andalusian	1933-34	N. Y. St.	Walter Dobe, Buffalo, N. Y.	218.00	202
Buttercup	1931-32	Florida	Edward Nowak, Pensacola, Fla.	218.60	225
W. L. R. Corn.	1951-52	Okla.	H. E. Parmenter, Denton, Tex.	131.60	122
Calif. Gray	1951-52	Calif.	York Poul. Br'g. Fm., Modesto, Calif.	291.00	300
Marlboro	1950-51	Georgia	Frederick Wyvill, Upper Marlboro, Md.	280.25	277
Delaware	1950-51	Maine	G. E. Coleman, Brunswick, Me.	293.95	274
W. Lang.	1934-35	Ill.	J. Schafer & Son, Springfield, Ill.	229.70	241
Dominique	1928-29	Maryland	ThurLOW Travis, Peekskill, N. Y.	.....	340
Bl. Lang.	1927-28	S. W. Tex.	Nick Weber, Terre Haute, Ind.	.....	203
Kiwi	1928-29	Missouri	W. L. Frank, Sherman, Tex.	.....	180
Crossbred	1955-56	Conn.	J. J. Warren, North Brookfield, Mass.	370.40	342
Incross	1949-50	West. N. Y.	Rucker's Imp. Br'g. Fm., Ottumwa, Iowa	362.85	330

* Prior to 1950 these records were compiled by the American Poultry Journal. All records from 1950-51 on are based on a test year of 50 weeks. Prior to 1950-51 the records were based on 51 weeks.

ALL TIME HIGH PEN RECORDS FOR EACH BREED IN ALL U. S. STANDARD TESTS
(BASED ON TOTAL POINTS)

<u>Breed</u>	<u>Year*</u>	<u>Test</u>	<u>Owner</u>	<u>Points</u>	<u>Eggs</u>
S. C. Wh. Leg.	1944-45	West. N. Y.	Babcock Poul. Fm., Ithaca, N. Y.	4336.25	4057
Bf. Leg.	1940-41	Okla.	Ward's Poul. Fm., Guthrie, Okla.	2286.80	2292
Bl. Leg.	1949-50	N. J. Hunt.	A. E. Hampton, Pittstown, N. J.	2839.95	2713
Br. Leg.	1952-53	N. J. Hunt.	Charles Kiefer, Toms River, N. J.	2990.05	2935
Exch. Leg.	1933-34	Fla.	Harry L. Day, Hudson, S. D.	1835.80	1854
R. C. Wh. Leg.	1927-28	Mo. St.	Amer. R. C. White Leghorn Club	.....	2017
R. I. Red	1948-49	Conn.	J. J. Warren, No. Brookfield, Mass.	4309.15	3966
R. C. R. I. Red	1940-41	Texas	Ia. Master Breeders, Sioux Falls, S. D.	2635.50	2514
R. I. White	1935-36	Texas	Blue Ribbon Fm., Sabetha, Kan.	1962.85	2152
N. Hamp.	1947-48	West. N. Y.	Hubbard Farms, Walpole, N. H.	3980.60	3715
N. H. White	1941-42	Missouri	Imperial Br'g. Fm., Ottumwa, Ia.	2240.80	2291
Bar. P. Rock	1940-41	Georgia	T. N. Wilcox, Tryon, N. C.	4222.95	3943
Wh. P. Rock	1952-53	Okla.	Capital Br'g. Fm., St. Paul, Minn.	3529.60	3414
Col. P. Rock	1949-50	Florida	Lago Vista, DeLand, Fla.	2740.95	2904
Bf. P. Rock	1945-46	Missouri	A. Eichelberger, Pekin, Ill.	2321.40	2208
Part. Rock	1941-42	Florida	F. G. Romance, Cienaga, Havana, Cuba	1429.05	1463
R. C. B. Rock	1927-28	Yst. F.	Chas. Staaf, Gladstone, N. J.	.....	314
Ancona	1942-43	Penna.	Raymond Thomas, Saltillo, Pa.	3057.25	2927
Bl. Aust.	1951-52	Missouri	Berry's Vitality Fm., Effingham, Kan.	3316.95	3140
W. Wyan.	1949-50	Calif.	Harvey E. Taylor, Cedar Lake, Ind.	3454.40	3330
S. L. Wyan.	1948-49	Maine	Wellington Wells, Millis, Mass.	2204.95	2215
Col. Wyan	1931-32	Florida	S. H. Palmer, Lake Como, Fla.	1764.65	1840
Buff Wyan.	1930-31	Ala.	Far-A-Way Farm, Royersford, Pa.	1535.00	1638
Gold Wyan.	1924-25	Mo. St.	J. L. Emrah, Puxico, Mo.	.....	1008
Wh. Min.	1941-42	Texas	T. D. Brown, Tulsa, Okla.	2741.35	2596
Bl. Min.	1949-50	N. J. Hunt.	Stephen Costa, Minotola, N. J.	2820.85	2661
Bf. Min.	1945-46	N. Y. St.	Rusk Poul. Fm., Windsor, Mo.	2205.25	2268
J. W. Giant	1941-42	Maine	Imperial Br'g. Fm., Ottumwa, Iowa	2700.55	2615
J. B. Giant	1931-32	N. J. Pass.	F. V. Dufresne, Reidsville, N. C.	2024.55	1887
Bf. Orp.	1951-52	Okla.	M. A. Watkins, Nowata, Okla.	3069.50	2863
Wh. Orp.	1925-26	N. J. Vine.	J. I. Lyle, Plainfield, N. J.	.....	1910
Lamona	1938-39	Conn.	S. E. Raymond, Chardon, Ohio	2190.50	2056
L. Brahma	1940-41	Texas	Superior Hty., Windsor, Mo.	2362.55	2216
S. Camp.	1935-36	N. J. Hunt.	Bestcroft, Galva, Ill.	1744.40	1723
Lac. Barn.	1942-43	N. Y. St.	Walter Dobe, Buffalo, N. Y.	2426.25	2343
Wh. Barn	1933-34	Maine	A. D. Arnold, W. Saugerties, N. Y.	703.00	750
Sp. Sussex	1930-31	Texas	R. A. Padgett, Rich Hill, Mo.	1575.25	1602
Lt. Sussex	1945-46	Maine	Miriam B. Parlin, Englewood, N. J.	3023.25	3119
Houdan	1930-31	N. J. Pass.	Skyland Farm, Sterlington, N. Y.	1448.30	1393
Hamburg	1956-57	Mo.	A. M. Stodel, VanNuys, Calif.	2017.30	2084
Andalusian	1934-35	N. Y. St.	Walter Dobe, Buffalo, N. Y.	1424.15	1357
Buttercup	1931-32	Florida	D. C. Gilles, Tallahassee, Fla.	1366.30	1393
W. L. R. Corn.	1951-52	Okla.	H. E. Parmenter, Denton, Tex.	1248.10	1360
Calif. Gray	1952-53	Okla.	Dryden Poul. Br'g. Fm., Modesto, Calif.	3038.10	3003
Marlboro	1950-51	Georgia	Frederick Wyvill, Upper Marlboro, Md.	2722.25	2587
Delaware	1950-51	Maine	G. E. Coleman, Brunswick, Me.	3001.40	2954
W. Lang.	1927-28	Mo. St.	Virginia Kreigh, Mexico, Mo.	.....	1937
Dominique	1928-29	Maryland	Thurlo w Travis, Peekskill, N. Y.	.....	1702
Bl. Lang.	1927-28	S. W. Tex.	BlackLangshan Club of America	.....	1565
Kiwi	1927-28	Georgia	C. I. Cowden, Atlanta, Ga.	.....	1352
R. P. Game	1929-30	Penna.	New Penna. Game Club	.....	1176
W. Cornish	1929-30	Penna.	H. H. Landis, Telford, Pa.	.....	1142
Rhineland	1926-27	Illinois	F. A. Banderob, Huntley, Mont.	.....	440
Crossbred	1958-59	Conn.	J. J. Warren, NorthBrookfield, Mass.	4184.35	3900
Incross	1952-53	Florida	Blanton Smith, Nashville, Tenn.	3948.30	3756

*Prior to 1950-51 all records were based on 51 weeks. Since 1950-51 the test year has been 50 weeks.

AVERAGE ANNUAL PRODUCTION AND MORTALITY OF BIRDS ENTERED IN THE
STANDARD EGG LAYING TESTS OF THE UNITED STATES FOR THE
THREE YEAR PERIOD ENDING SEPTEMBER 15, 1961

Owner & Address	Breed	No. of Birds Entered	Points Per Bird	Eggs Per Bird	Per Cent Mortality	Ave. Egg Size Oz. /Doz.
Albermarle Acres, Unadilla, N. Y.	WL	78	265.90	255.37	9.0	24.96
Anthony, Geo. M. & Sons, Strausstown, Penna.	WL	130	256.08	251.14	13.8	25.27
Bagby Poultry Farm, Sedalia, Mo.	WL	78	266.03	245.49	5.1	26.32
Booth Farms & Hatchery, Clinton, Mo.	WL	260	245.39	236.95	12.7	25.76
Burkett Breeding Farms, Greenbrier, Ark.	WL	156	266.77	260.42	10.9	25.37
Cashman Leghorn Farm Webster, Ky.	WL	338	274.03	265.79	5.0	25.00
Dirkse, R., Zeeland, Mich.	WL	260	246.48	241.45	8.5	25.28
Drake, John W., Skilman, N. J.	WL	39	278.46	266.10	7.7	25.43
Eby's Poultry Farm, Carrolton, Texas	WL	78	262.94	252.32	2.6	24.64
Foreman Poultry Farm, Lowell, Mich.	WL	221	239.23	236.09	15.5	24.70
Hanson, J. A. & Sons, Corvallis, Oregon	WL	117	260.69	251.74	15.4	25.60
Hendrickson, H. F. & R. G., Bridgehampton, N. Y.	WL	39	241.47	226.13	5.1	26.40
Midwest Poultry Farm, Marshall, Mo.	WL	65	256.91	243.20	6.2	26.83
Missouri Valley Hatchery, Marshall, Mo.	WL	91	247.50	242.10	6.6	26.27
Avery, C. T. & Sons, Colrain, Mass.	RIR	65	284.34	267.83	6.2	25.87
Crooks, Donald L., North Brookfield, Mass.	RIR	130	263.27	243.38	3.1	27.36
Harco Orchards, South Easton, Mass.	RIR	195	290.82	268.36	5.6	26.96
Midwest Poultry Farm, Marshall, Mo.	RIR	39	227.02	221.62	0.0	26.81
Missouri Valley Hatchery, Marshall, Mo.	RIR	39	208.27	205.90	5.1	26.35
Parmenter Reds, Inc., Franklin, Mass.	RIR	234	239.65	230.62	8.5	25.91
Bagby Poultry Farm, Sedalia, Mo.	NH	39	225.32	223.13	7.7	25.68
Harco Orchards, South Easton, Mass.	BPR	195	285.17	266.63	5.6	26.50
Botkin Poultry Farm, Berea, Ky.	WPR	104	234.67	228.13	5.8	25.08
Lee's Poultry Farm, Brookville, Ohio	WPR	39	219.79	212.44	5.1	25.71
Pilch Poultry Farm, Hazardville, Conn.	WPR	65	222.06	207.94	7.7	26.44
Anderson, Ralph, W., Hanover, Mass.	Cr.	78	265.97	246.40	2.6	26.45
Harco Orchards, South Easton, Mass.	Cr.	234	291.05	270.13	6.0	26.38
Hubbard Farms, Walpole, N. H.	Cr.	260	263.58	250.60	8.8	25.88

THREE YEAR AVERAGES (Cont'd.)

Owner & Address	Breed	No. of Birds Entered	Points Per Bird	Eggs Per Bird	Per Cent Mortality	Ave. Egg Size Oz. /Doz.
Missouri Valley Hatchery, Marshall, Mo.	Cr.	39	250.67	237.33	2.6	26.39
Park's Poultry Farm, Altoona, Penna.	Cr.	130	241.10	233.38	10.0	26.10
Twarog, John, C., Taftville, Conn.	Cr.	39	286.88	270.21	0.0	25.90
Booth Farms & Hatchery, Clinton, Mo.	Inc.	65	254.55	242.16	13.8	25.93
Colonial Poultry Farm, Pleasant Hill, Mo.	Inc.	182	232.17	218.69	13.7	26.24
Reynolds, Mrs. Ruth O., Indianapolis, Ind.	Col. P. R.	39	175.42	181.97	15.4	23.87

AVERAGE ANNUAL PRODUCTION AND MORTALITY OF BIRDS ENTERED IN THE
STANDARD EGG LAYING TESTS OF THE UNITED STATES FOR THE
TEN YEAR PERIOD ENDING SEPTEMBER 15, 1961

Owner & Address	Breed	No. of Birds Entered	Points Per Bird	Eggs Per Bird	Per Cent Mortality	Ave. Egg Size Oz. /Doz.
Anthony, Geo. M. & Sons, Strausstown, Penna.	WL	507	260.06	251.05	9.5	25.22
Bagby Poultry Farm, Sedalia, Mo.	WL	221	244.71	230.61	8.6	25.45
Booth Farms & Hatchery, Clinton, Mo.	WL	884	250.55	240.93	11.9	25.65
Cashman's Leghorn Farm, Webster, Ky.	WL	988	263.94	251.75	7.4	25.36
Foreman Poultry Farm, Lowell, Mich.	WL	1508	256.01	245.54	10.7	25.20
Hanson, J. A. & Son, Corvallis, Oregon	WL	858	261.91	252.81	16.4	25.00
Hendrickson, H. F. & R. G., Bridgehampton, N. Y.	WL	130	238.43	228.00	8.5	24.99
Missouri Valley Hatchery, Marshall, Mo.	WL	273	248.00	245.47	7.3	25.51
Avery, C. T. & Sons, Colrain, Mass.	RIR	260	274.44	257.75	6.2	25.84
Crooks, Donald L., North Brookfield, Mass.	RIR	728	258.29	242.45	7.6	25.79
Harco Orchards, South Easton, Mass.	RIR	676	280.81	261.46	9.6	26.28
Missouri Valley Hatchery, Marshall, Mo.	RIR	156	227.25	219.99	6.4	25.23
Parmenter Reds, Inc., Franklin, Mass.	RIR	988	235.98	226.69	11.2	25.37
Bagby Poultry Farm, Sedalia, Mo.	NH	143	232.87	227.25	6.3	24.96
Harco Orchards, South Easton, Mass.	BPR	624	272.66	260.01	5.8	25.64
Lee's Poultry Farm, Brookville, Ohio	WPR	221	223.36	219.80	9.1	24.89

